ARCHITECTURAL ABBREVIATIONS

&	AND	FCO	FLOOR CLEAN OUT	OFF	OFFICE			UC	UNDERCUT	VWC	VINYL WALLCOVERING
@	AT	FD	FLOOR DRAIN	OPG / OPNG	OPENING			UG	UNDERGROUND	W	WEST
A	ANGLE	FDN	FOUNDATION	OPP	OPPOSITE			UL	UNDERWRITER'S LABORATORY	W/	WITH
A/C	AIR CONDITIONER / CONDITIONING	FE	FIRE EXTINGUISHER	OZ	OUNCE			UNF / UNFIN	UNFINISHED	W/O	WITHOUT
ABV	ABOVE	FEC	FIRE EXTINGUISHER CABINET					UON	UNLESS OTHERWISE NOTED	WC	WATER CLOSET
ACCS	ACCESSORIES	FEC (R)	FIRE EXTINGUISHER CABINET, RECESSED	PART	PARTIAL			UPS	UNINTERRUPTIBLE POWER SUPPLY	WCV	WALLCOVERING
ACSDR	ACCESS DOOR			PAT	PATTERN			UR	URINAL	WD	WOOD
ACSFLR	ACCESS FLOOR	FEC (SR)	FIRE EXTINGUISHER CABINET, SEMI-RECESSED	PBD	PARTICLE BOARD					WF	WIDE FLANGE
ACST / ACOUS	ACOUSTICAL			PC / PCC	PRECAST CONCRETE					WG	WIRE GLASS
ACT	ACOUSTICAL CEILING TILE	FEW	FIRE EXTINGUISHER, WALL MOUNTED	PED	PEDESTAL			V	VOLT	WH	WALL HOSE / HYDRANT
AD	AREA DRAIN	FF	FINISH FLOOR	PER	PERIMETER			VAC	VACUUM	WI	WROUGHT IRON
ADA	AMERICANS WITH DISABILITIES ACT	FGL	FIBERGLASS	PERF	PERFORATED			VB	VAPOR BARRIER	WIN	WINDOW
ADDL	ADDITIONAL	FIN	FINISH(ED)	PERP	PERPENDICULAR			VCT	VINYL COMPOSITION TILE	WK	WORK
ADDM	ADDENDUM	FIXT	FIXTURE	PF	PRE-FINISHED			VENT	VENTILATE	WNSCT	WAINSCOT
ADJ	ADJUSTABLE / ADJACENT	FL	FLOOR	PIP	POURED-IN-PLACE			VERT	VERTICAL	WP	WATERPROOF(ING)
ADMIN	ADMINISTRATION	FLASH	FLASH(ING)	PL	PROPERTY LINE			VEST	VESTIBULE	WPT	WORK POINT
AFC	ABOVE FINISHED COUNTER	FLUOR	FLUORESCENT	PL	PLATE			VIF	VERIFY IN FIELD	WR	WATER RESISTANT
AFF	ABOVE FINISHED FLOOR	FOC	FACE OF CONCRETE	PLAM	PLASTIC LAMINATE			VNR	VENEER	WRR	WOOD RISER
AFG	ABOVE FINISHED GRADE	FOF	FACE OF FINISH	PLAS	PLASTER			VOL	VOLUME	WSD	WINDOW SHADING DEVICE
AFS	ABOVE FINISHED SLAB	FOM	FACE OF MASONRY	PLYWD	PLYWOOD			VST	VINYL STAIR TREADS	WT	WEIGHT
AGGR	AGGREGATE	FOS	FACE OF STUDS	PMF	PRESSED METAL FRAMES			VSTR	VINTYL STAIR TREADS & RISERS		
AHR	ANCHOR	FOW	FACE OF WALL	POP	POINT OF PRESENCE			VT	VINYL TILE		
AHU	AIR HANDLING UNIT	FP	FIREPROOF	PR	PAIR			VTR	VENT THRU ROOF	YD	YARD
AL / ALUM	ALUMINUM	FPL	FIREPLACE	PRCST	PRE-CAST						
ALNMT	ALIGNMENT	FR	FRAME	PREFAB	PREFABRICATED						
ALT	ALTERNATE	FRC	FIBER REINFORCED CONCRETE	PROP	PROPERTY						
ANOD	ANODIZED	FRGP	FIBER REINFORCED GYPSUM PLASTER	PRT	PORCELAIN TILE						
AP	ACCESS PANEL	FRT	FIRE RETARDANT TREATED	PSF	POUNDS PER SQUARE FOOT						
APC	ACOUSTICAL PANEL CEILING	FS	FLOOR SINK	PSI	POUNDS PER SQUARE INCH						
APPROX	APPROXIMATELY	FTG	FOOTING	PT	POINT						
APPVD	APPROVED	FURR	FURRING	PTD	PAPER TOWEL DISPENSER						
ARCH	ARCHITECT(URAL)	FUT	FUTURE	PTD/WR	PAPER TOWEL DISPENSER &WASTE RECEPTACLE						
ASPH	ASPHALT										
ASTM	AMERICAN SOCIETY FOR TESTING MATERIALS	GA	GAUGE	PTDF	PRESSURE TREATED DOUGLAS FIR						
		GALV	GALVANIZE(D)	PTN	PARTITION						
AUTO	AUTOMATIC	GB	GRAB BAR	PTR	PAPER TOWEL RECEPTACLE						
AVG	AVERAGE	GC	GENERAL CONTRACTOR	PVC	POLYVINYL CHLORIDE						
		GL	GLASS / GLAZING								
BD	BOARD	GND	GROUND	Q	QUARTZ						
BET	BETWEEN	GR	GRADE	QT	QUARRY TILE						
BG	BUMPER GUARD	GRV	GRAVEL	QTY	QUANTITY						
BIPV	BUILDING INTEGRATED PHOTO-VOLTAICS	GT	GLASS TILE								
		GYP	GYPSUM	R	RISER						
BITUM	BITUMINOUS	GYP BD	GYPSUM BOARD	RAD	RADIUS						
BL	BLACK			RB	RUBBER BASE						
BLDG	BUILDING	HB	HOSE BIB	RCP	REFLECTED CEILING PLAN						
BLK	BLOCK	HC	HOLLOW CORE	RD	ROOF DRAIN						
BLKG	BLOCKING	HCP	HANDICAPPED	REF	REFERENCE						
BM	BEAM	HD	HEAVY DUTY	REFR	REFRIGERATOR						
BMS	BALANCE MAGNETIC SWITCH	HD	HARD	REG	REGISTER						
BOS	BOTTOM OF STEEL	HDR	HEADER	REINF	REINFORCE(D)						
BOT	BOTTOM	HDWR	HARDWARE	REQ	REQUIRED						
BS	BOTH SIDES	HI	HIGH	RESIL	RESILIENT						
		HM	HOLLOW METAL	RESS	RESILIENT SHEET						
CAB	CABINET	HMI	HOLLOW METAL INSULATED	REST	RESILIENT TILE						
CAS	CASEWORK	HOR / HORIZ	HORIZONTAL	RET	RETAINING						
CB	CATCH BASIN	HP	HIGH POINT	REV	REVISE / REVISION						
CEM	CEMENT	HR	HANDRAIL	RFG	ROOFING						
CER	CERAMIC	HR	HOUR	RFL	REFLECTED						
CF	CUBIC FOOT	HT	HEIGHT	RH	RIGHT HAND						
CG	CORNER GUARD	HVAC	HEATING / VENTILATION / AIR CONDITIONING	RM	ROOM						
CH	CEILING HEIGHT			RO	ROUGH OPENING						
CHAM	CHAMFER	HW	HARDWARE	RS	RUBBER SHEET FLOORING						
CHBD	CHALKBOARD	HYD	HYDRANT	RST	RUBBER STAIR TREADS						
CI	CAST IRON			RSTR	RUBBER STAIR TREADS & RISERS						
CI	CONTRACTOR INSTALLED	ID	INSIDE DIAMETER	RT	RUBBER TILE						
CIP	CAST IN PLACE	IN	INCH / INCHES	RWD	REDWOOD						
CJ	CONTROL JOINT	INCL	INCLUDE(D) / INCLUDING	RWL	RAIN WATER LEADER						
CL	CENTER LINE	INSUL	INSULATE / INSULATION								
CLG	CEILING	INT	INTERIOR	S	SOUTH						
CLO	CLOSET			SC	SOLID CORE						
CLR	CLEAR	JAN	JANITOR	SCD	SEAT COVER DISPENSER						
CMU	CONCRETE MASONRY UNIT	JT	JOINT	SCHED	SCHEDULE						
CO	CLEAN/CLEAR OUT			SCN	SCREEN						
COL	COLUMN	KIT	KITCHEN	SCR	SCREEN						
CONC	CONCRETE			SD	SOAP DISPENSER / STORM DRAIN						
CONST	CONSTRUCTION	LAB	LABORATORY	SDC	SEALED CONCRETE						
CONT	CONTINUOUS	LAM	LAMINATE(D)	SECT	SECTION						
CORR	CORRIDOR	LAV	LAVATORY	SF	SQUARE FEET						
CPR	COPPER	LB(S)	POUND(S)	SHT	SHEET						
CPT	CARPET(ED)(ING)	LF	LINEAR FOOT (FEET)	SHTG	SHEATHING						
CT	CERAMIC TILE	LH	LEFT HAND	SHWR	SHOWER						
CTR	COUNTER	LIB	LIBRARY	SIM	SIMILAR						
		LKR	LOCKER	SND	SANITARY NAPKIN DISPENSER						
DBL	DOUBLE	LNS	LINOLEUM SHEET	SNR	SANITARY NAPKIN RECEPTACLE						
DEFS	DIRECT APPLIED EXTERIOR FINISH SYSTEM	LNT	LINOLEUM TILE	SOG	SLAB ON GRADE						
		LP	LOW POINT	SPEC	SPECIFY / SPECIFICATION						
DEG	DEGREE	LT	LIGHT	SPK	SPEAKER						
DEMO	DEMOLISH	LVR	LOUVER	SQ	SQUARE						
DEP	DEPRESSION	LWT	LIGHT WEIGHT	SQFT	SQUARE FEET						
DET	DETAIL			SQIN	SQUARE INCH(ES)						
DF	DRINKING FOUNTAIN	MACH	MACHINE	SS	STAINLESS STEEL						
DIA	DIAMETER	MAINT	MAINTENANCE	ST	STONE						
DIAG	DIAGONAL	MATL	MATERIAL	STA	STATION						
DIM	DIMENSION	MAX	MAXIMUM	STC	STAINED CONCRETE						
DISP	DISPENSER	MC	MEDICINE CABINET	STD	STANDARD						
DIV	DIVISION	ME	MECHANICAL EQUIPMENT	STDS	STUDS						
DN	DOWN	MECH	MECHANICAL	STIFF	STIFFENER						
DR	DOOR	MEZZ	MEZZANINE	STL	STEEL						
DS	DOWNSPOUT	MFR	MANUFACTURE(R)	STN	STAINED						
DWG	DRAWING	MH	MANHOLE	STOR	STORAGE						
		MIN	MINIMUM	STRUCT	STRUCTURE / STRUCTURAL						
E	EAST	MIR	MIRROR	SUSP	SUSPENDED						
EA	EACH	MISC	MISCELLANEOUS	SW	SWITCH						
EF	EACH FREE	MLD / MLDG	MOULDING	SYM	SYMMETRICAL						
EIFS	EXTERIOR INSULATION AND FINISH SYSTEM	MO	MASONRY OPENING	SYN	SYNTHETIC						
		MR	MOISTURE RESISTANT	SYS	SYSTEM						
EJ	EXPANSION JOINT	MTD	MOUNTED								
EL	ELEVATION	MTL	METAL	T&B	TOP AND BOTTOM						
ELEC	ELECTRICAL	MUL	MULLION	T&G	TONGUE AND GROOVE						
ELEV	ELEVATOR			TB	TOWEL BAR						
EMER	EMERGENCY	N	NORTH	TBD	TO BE DETERMINED						
ENCL	ENCLOSED / ENCLOSURE	NA OR N/A	NOT AVAILABLE / APPLICABLE	TC	TOP OF CURB						
ENG	ENGINEER	NFPA	NATIONAL FIRE PROTECTION ASSOCIATION	TEL	TELEPHONE						
EOD	EDGE OF DECK			TEMP	TEMPORARY / TEMPERATURE						
EOS	EDGE OF SLAB	NIC	NOT IN CONTRACT	TER	TERRAZZO						
EQ	EQUAL(LY)	NO / #	NUMBER	THK	THICK						
EQPT	EQUIPMENT	NOM	NOMINAL	THRU	THROUGH						
EST	ESTIMATE	NTS	NOT TO SCALE	TOC	TOP OF CONCRETE						
EWC	ELECTRIC WATER COOLER			TOS	TOP OF SLAB						
EXIST	EXISTING	OA	OVERALL	TOW	TOP OF WALL						
EXP	EXPANSION	OBS	OBSCURE	TPD	TOILET PAPER DISPENSER						
EXT	EXTERIOR	OC	ON CENTER	TPTN	TOILET PARTITION						
		OD	OUTSIDE DIAMETER	TV	TELEVISION						
FA	FIRE ALARM	OFCI	OWNER FURNISHED CONTRACTOR INSTALLED	TYP	TYPICAL						
FAST	FASTEN(ER)										

MATERIALS LEGEND

WALL/PARTITION METAL STUD FRAMED

BATT INSULATION

CONCRETE

EARTH

RIGID INSULATION

PLAST,GWB,STUCCO,SETTING BEDS

STEEL/METAL

ROCK FILL

GENERAL NOTES

1. DOOR LOCATIONS NOT DIMENSIONED ARE:
 A. JAMB FACE 6" FROM FACE OF STUD
 B. CENTER THE DOOR ON CENTER LINE OF ROOM OR CORRIDOR
 C. 24" MIN. EXTERIOR AND 18" MIN INTERIOR CLEAR BEYOND STRIKE EDGE OF A GATE OR DOOR ON THE SIDE TOWARDS WHICH IT SWINGS

2. LINE OF EXISTING GRADES, AS SHOWN ON THE BUILDING ELEVATIONS AND SECTIONS ARE APPROXIMATE. THEY ARE AT THE BUILDING FACE, OR ON THE SECTION END EXCEPT AS NOTED, VERIFY. FOR SPECIFIC INFORMATION SEE GRADING PLAN.

3. UNLESS OTHERWISE NOTED, PLAN DIMENSIONS ARE TO CENTERLINE OF COLUMNS, FACE OF CONCRETE OR CMU AND FACE OF GYPSUM BOARD FINISH.

4. REPETITIVE FEATURES ARE NOT DRAWN IN THEIR ENTIRETY AND SHALL BE COMPLETELY PROVIDED AS IF DRAWN IN FULL.

5. VERIFY ALL ROUGH-IN DIMENSIONS FOR EQUIPMENT PROVIDED IN THIS CONTRACT, OR BY OTHERS.

6. THE STRUCTURAL, MECHANICAL AND ELECTRICAL DRAWINGS ARE SUPPLEMENTARY TO THE ARCHITECTURAL DRAWINGS. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO CHECK WITH THE ARCHITECTURAL DRAWINGS BEFORE THE INSTALLATION OF STRUCTURAL, MECHANICAL AND ELECTRICAL WORK. SHOULD THERE BE A DISCREPANCY BETWEEN THE ARCHITECTURAL DRAWINGS AND THE ENGINEERING DRAWINGS, IT SHOULD BE BROUGHT TO THE CONTRACTING OFFICER'S ATTENTION FOR CLARIFICATION PRIOR TO INSTALLATION OF SAID WORK. ANY WORK INSTALLED IN CONFLICT WITH THE ARCHITECTURAL DRAWINGS SHALL BE CORRECTED BY THE CONTRACTOR AT HIS EXPENSE AND AT NO ADDITIONAL COST TO THE GOVERNMENT.

7. SPECIFICATIONS, WHICH ARE BOUND SEPARATELY, ARE PART OF THESE CONTRACT DOCUMENTS.

8. DO NOT SCALE DRAWINGS. GENERAL CONTRACTOR SHALL VERIFY ALL DIMENSIONS, GRADES, CONDITIONS AT SITE PRIOR TO COMMENCING THE WORK, AND REPORT ANY DISCREPANCIES TO TO THE CONTRACTING OFFICER IN WRITING. DIMENSIONS SHALL TAKE PRECEDENCE OVER SCALES SHOWN ON DRAWINGS. CONTRACTOR SHALL NOTIFY CONTRACTING OFFICER WHERE DISCREPANCIES OCCUR BETWEEN DRAWINGS, GENERAL NOTES AND SPECIFICATIONS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE ACCURATE PLACEMENT OF THE BUILDING ON THE SITE.

9. ALL SYMBOLS AND ABBREVIATIONS USED ON THE DRAWINGS ARE CONSIDERED TO BE STANDARDS. IF THE CONTRACTOR HAS ANY QUESTIONS REGARDING SAME, OR OTHER EXACT MEANING, THE CONTRACTING OFFICER SHALL BE NOTIFIED FOR CLARIFICATION.

10. CONTRACTOR SHALL PROVIDE TEMPORARY EXIT SIGNS TO ASSURE A MEANS OF EGRESS DURING CONSTRUCTION.

11. GENERAL CONTRACTOR SHALL COORDINATE SITE PLUMBING, DRAINAGE, ELECTRICAL, TELEPHONE WORK AND EXISTING UTILITIES TO PROVIDE A COMPLETE OPERATING SYSTEM.

12. CONTRACTOR SHALL VERIFY ALL CONCRETE AND MASONRY OPENINGS IN THE FIELD PRIOR TO FABRICATION OF DOORS, WINDOWS, LOUVERS AND FRAMES.

13. CONTRACTOR SHALL VERIFY SIZES AND LOCATION OF MECHANICAL EQUIPMENT PADS AND BASES AS WELL AS POWER AND WATER OR DRAIN INSTALLATION WITH EQUIPMENT MANUFACTURERS BEFORE PROCEEDING WITH THE WORK. CHANGES TO ACCOMMODATE FIELD CONDITIONS OR SUBSTITUTIONS SHALL BE MADE WITHOUT ADDITIONAL CHARGE TO THE GOVERNMENT.

14. CONTRACTOR SHALL REVIEW THE LOCATION OF ALL FIRE LIFE SAFETY DEVICES WITH THE FIRE INSPECTOR AND THE CONTRACTING OFFICER FOR ON SITE APPROVAL PRIOR TO INSTALLATION.

15. OFFSET STUDS WHERE REQUIRED SO THAT FINISH WALL SURFACES WILL BE FLUSH.

16. INSTALL ALL METAL CORNER BEADS TO ALL EXPOSED WALL BOARD EDGES. INSTALL CASING BEAD WHEREVER WALLBOARD, PLASTER, ETC. ABUTS A DISSIMILAR FINISH MATERIAL AND PROVIDE SEALANT AS REQUIRED.

17. CONTRACTOR SHALL PROVIDE AND INSTALL ALL STIFFENERS, BRACING, BLOCKING, HANGERS, BACK-UP PLATES AND SUPPORTING BRACKETS REQUIRED FOR THE INSTALLATION OF ALL CASEWORK, TOILET ACCESSORIES, FIXTURES AND PARTITIONS AND ALL WALL MOUNTED OR SUSPENDED MECHANICAL, ELECTRICAL, OR MISCELLANEOUS EQUIPMENT AND FURNISHINGS.

18. VERIFY SIZE OF ALL MECHANICAL OPENINGS THROUGH THE ROOF WITH MECHANICAL EQUIPMENT MANUFACTURER.

19. FOR MECHANICAL OPENING SIZES AND LOCATIONS IN WALLS, CHECK WITH MECHANICAL DRAWINGS. AN ACOUSTICAL SEAL SHALL BE PROVIDED BETWEEN ALL DUCTS, PIPING, AND PARTITIONS.

20. GYPSUM BOARD SHALL EXTEND 6" ABOVE CEILING AT ALL COLUMN ENCLOSURES, NON-RATED PARTITIONS, AND EXTERIOR PERIMETER WALLS UNLESS OTHERWISE NOTED OR DETAILED.

21. EXTERIOR JOINTS AROUND WINDOW, DOOR FRAMES, BETWEEN WALLS AND FOUNDATIONS, BETWEEN WALLS AND ROOF, BETWEEN WALL PANELS, AND AT PENETRATIONS OF UTILITIES THROUGH THE ENVELOPE, SHALL BE SEALED, CAULKED WEATHER-STRIPPED TO LIMIT AIR LEAKAGE.

22. ALL DOOR SIZES SHOWN ON DOOR SCHEDULE ARE OPENING SIZES. ALLOWANCE FOR THRESHOLD, ETC. SHALL BE DEDUCTED. FRAMES SHALL BE REINFORCED WHERE REQUIRED FOR CLOSERS, STOPS AND HARDWARE.

23. ALL INTERIOR WALL AND CEILING FINISHES SHALL BE CLASS A AND FLOORS SHALL BE CLASS II MINIMUM PER NASA STD 8719.11.

24. SEE STRUCTURAL FOR EXTERIOR COLD-FORMED STEEL FRAMING NOTES, SCHEDULE, CONNECTIONS AND ANCHORING DETAILS

25. FIRESTOPPING MUST BE PROVIDED AT ALL FIRE-RATED WALLS PER CODE.

SYMBOLGY LEGEND

SEE SHEETS FOR SPECIFIC SYMBOLS

A-101 — SHEET NUMBER; SHEET NO. SEQUENCE; SHEET TYPE; DISCIPLINE

SHEET NUMBER

BLDG NORTH, TRUE NORTH

NORTH ARROW

1 / A — **GRID BUBBLES**

1 / A — **EXISTING GRID BUBBLES**

PLAN OR DETAIL CALLOUT; PLAN OR DETAIL TITLE

1 View Name

A101 | REF: R101 | SCALE: 1/8" = 1'-0"

SHEET NUMBER; REFERENCE LOCATION

PLAN OR DETAIL TITLE

SCALE: 1/16" = 1'-0"

0' 8' 16' 32' 64'

GRAPHIC SCALE

EXTERIOR ELEVATION CALLOUT; SHEET ON WHICH ELEVATION IS DRAWN (1 / A301)

ELEVATION REFERENCE

INTERIOR ELEVATION CALLOUT; SHEET ON WHICH ELEVATION IS DRAWN (A / B A601 D / C)

INTERIOR ELEVATION REFERENCE

BUILDING SECTION NUMBER; SHEET ON WHICH SECTION IS DRAWN; SIM; 1 / A101

BUILDING SECTION REFERENCE

BUILDING SECTION NUMBER; SHEET ON WHICH SECTION IS DRAWN; SIM; 1 / A101

WALL SECTION REFERENCE

DETAIL SECTION NUMBER; SHEET ON WHICH SECTION IS DRAWN; SIM; 1 / A101

DETAIL SECTION REFERENCE

DETAIL SECTION NUMBER; SHEET ON WHICH SECTION IS DRAWN; SIM; 1 / A101

DETAIL CALLOUT REFERENCE

Room Name; Room Name 0-0000

ROOM NAME W/ ROOM NUMBER

Room Name 0-0000 NET SF

W/AREA

Room Name 0-0000 NET SF OCC = #

W/ OCCUPANT LOAD

D101A — **DOOR TAG**

A22 — **CURTAIN WALL TAG**

S22 — **SHADE LOUVER TAG**

XX — **WALL TAG**

MFT-1 — **MATERIAL TAG**

XX — **WINDOW SHADE TAG**

22.22 — **KEYNOTE TAG**

EL: +10'-0" — **SPOT ELEVATION**

LEVEL NAME EL 0'-0" — **LEVEL HEADS**

1 / A101 — **MATCHLINE REFERENCE**

℄ — **CENTERLINE TAG**

1 — **REVISION CALLOUT AND CLOUD**

FIRE EXTINGUISHER LEGEND

FE(C)-1 TYPE 2-A (MULTIPURPOSE DRY CHEMICAL)
FE(C)-2 TYPE 3-A (MULTIPURPOSE DRY CHEMICAL)

FE-3 TYPE 10-B (MULTIPURPOSE DRY CHEMICAL)
FE-4 TYPE 2-C (CARBON DIOXIDE)

(C) INDICATES FIRE EXTINGUISHERS WITH CABINETS (FOR EXTINGUISHERS NOT INSTALLED IN CABINETS A MOUNTING BRACKET IS REQUIRED). NOTE: ALL FE CABINETS ARE FULLY-RECESSED UNLESS OTHERWISE NOTED.

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
3.1 CAST IN PLACE CONCRETE
3.2 6" CONC HOUSEKEEPING PAD
3.3 VAPOR BARRIER
3.4 GRANULAR FILL
3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
5.1 STEEL BEAM
5.2 STEEL COLUMN
5.3 METAL DECK
5.4 STEEL ANGLE
5.5 STEEL PLATE
5.6 TUBULAR STEEL
5.7 STEEL BENT PLATE
5.8 STAINLESS STEEL FRAME
5.9 OPEN WEB STEEL JOIST
5.10 S.S. BOLLARD (6" SQ)
5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
5.12 CANE DETECTION RAIL
5.13 GUARDRAIL
5.14 STAINLESS STEEL HANDRAIL
5.15 METAL FRAMED STAIR
5.16 STEEL CHANNEL
5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
5.20 DECORATIVE METAL MESH VINESCREEN
5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
6.3 5/8" GLASS MAT FACED GYP SHEATHING
6.4 PLASTIC LAMINATE
6.5 SOLID-SURFACING MATERIAL COUNTERTOP
6.6 (NOT USED)
6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
7.2 PVC ROOFING
7.3 MEMBRANE EDGE FASTENER @ 12" O/C
7.4 1/4" PROTECTION BOARD
7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
7.6 BATT INSULATION R=19
7.7 PVC MEMBRANE FLASHING
7.8 EXTRUDED ALUM TRIM
7.9 ALUM FLASHING
7.10 FORMED SHEET SS COPING
7.11 BELOW GRADE DAMP/WATERPROOFING
7.12 SEALANT WITH BACKER ROD
7.13 20 GA GALVANIZED SPLASH PAN
7.14 DOWN SPOUT
7.15 WATERPROOFING MEMBRANE
7.16 INSULATED METAL PANEL CLADDING
7.17 PVC ROOF SEISMIC JOINT COVER
7.18 EXTERIOR WALL SEISMIC JOINT COVER
7.19 INTERIOR WALL SEISMIC JOINT COVER
7.20 CEILING SEISMIC JOINT COVER
7.21 FIRESTOPPING
7.22 SAND COATED ROOF WALKWAY
7.23 METAL SPANDREL PANEL (INSULATED)
7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
7.27 FLOOR SEISMIC JOINT COVER
7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
7.29 METAL PANEL SOFFIT
7.30 1" RIGID INSULATION BOARD
7.31 WATERPROOF TRAFFIC COATING
7.32 COMPRESSION SEAL
7.33 SILICONE SEALANT
7.34 NEOPRENE SPACER (BLACK).
7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
7.36 1/2" FOIL-BACKED RIGID INSULATION
7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
8.1 DOOR & FRAME
8.2 MOTORIZED OPERABLE WINDOW
8.3 MANUAL OPERABLE WINDOW
8.4 AUTOMATIC DOOR BOTTOM
8.5 THRESHOLD
8.6 GLAZED ALUM CURTAIN WALL SYSTEM
8.7 1" INSULATED GLAZING
8.8 FRITTED GLAZING
8.9 SPANDREL GLAZING
8.10 VISION GLASS (SAFETY WHERE REQUIRED)
8.11 (NOT USED)
8.12 AUTOMATIC ENTRANCE DOOR
8.13 SKYLIGHT
8.14 WEATHERSTRIPPING
8.15 MTL SECURITY GATE
8.16 DOOR PULL
8.17 AUTOMATIC DOOR OPERATOR
8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
9.1 1/2" GWB TYPE X
9.2 5/8" GWB TYPE X
9.3 1" GWB SHAFT LINER
9.4 20 GA MTL STUD @ 16" O/C
9.5 SLOTTED SLIP TRACK
9.6 METAL STUD TRACK
9.7 COLD FORMED FURRING CHANNEL
9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
9.9 FRAMING ANGLE, MIN 20 GA GALV
9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
9.11 SHAFT J RUNNER
9.12 CERAMIC TILE
9.13 REINFORCED MORTAR SETTING BED
9.14 SCHEDULED FLOORING
9.15 SUSPENDED GYP BOARD CEILING SYSTEM
9.16 SCHEDULED WALL BASE
9.17 PAINT
9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
9.20 3/4" RECLAIMED WOOD FLOORING
9.21 SOUND ATTENUATION BLANKET
9.22 ACOUSTICAL INSULATION 3" (UON)
9.23 SUSPENDED ACOUSTICAL CEILING
9.24 STONE TILE
9.25 RECLAIMED WOOD WALL PANEL
9.26 METAL COATINGS AND SEALER
9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
10.1 TOILET PARTITION
10.2 (NOT USED)
10.3 METAL LOCKER
10.4 FIRE EXTINGUISHER CABINET
10.5 DOOR STOP
10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
10.7 VINE SCREEN SYSTEM
10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
11.1 MOTORIZED PROJECTION SCREEN
11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
12.1 MOTORIZED WINDOW SHADE
12.2 SYSTEM FURNITURE, NIC
12.3 ENTRANCE FLOOR MAT & FRAME
12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
21.1 FIRE SPRINKLER HEAD
21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
22.1 ROOF DRAIN
22.2 NOT USED
22.3 VENT THROUGH ROOF
22.4 ELECTRIC WATER COOLER
22.5 KITCHEN SINK
22.6 SERVICE SINK
22.7 FLOOR DRAIN
22.8 FILTERED WATER SYSTEM FAUCET
22.9 DUAL FLUSH TOILET
22.10 HIGH EFFICIENCY TOILET
22.11 LOW CONSUMPTION URINAL
22.12 COUNTERTOP SINK
22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
22.14 HAND SHOWER SET WITH SLIDE BAR
22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
23.1 BOILER FLUE
23.2 DUCT
23.3 PERIMETER HYDRONIC HEATER
23.4 FIRE DAMPER
23.5 RADIANT CEILING PANEL
23.6 MECHANICAL SHAFT OPENING
23.7 RADIANT FLOOR SLAB SYSTEM
23.8 MECHANICAL PIPING
23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
26.1 LIGHT FIXTURE
26.2 CARD READER
26.3 PHOTOVOLTAIC INVERTER
26.4 POWER - DUPLEX
26.5 POWER - QUAD
26.6 POWER/DATA OUTLET COMBINATION
26.7 SWITCH
26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
32.1 CONCRETE PAVING

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

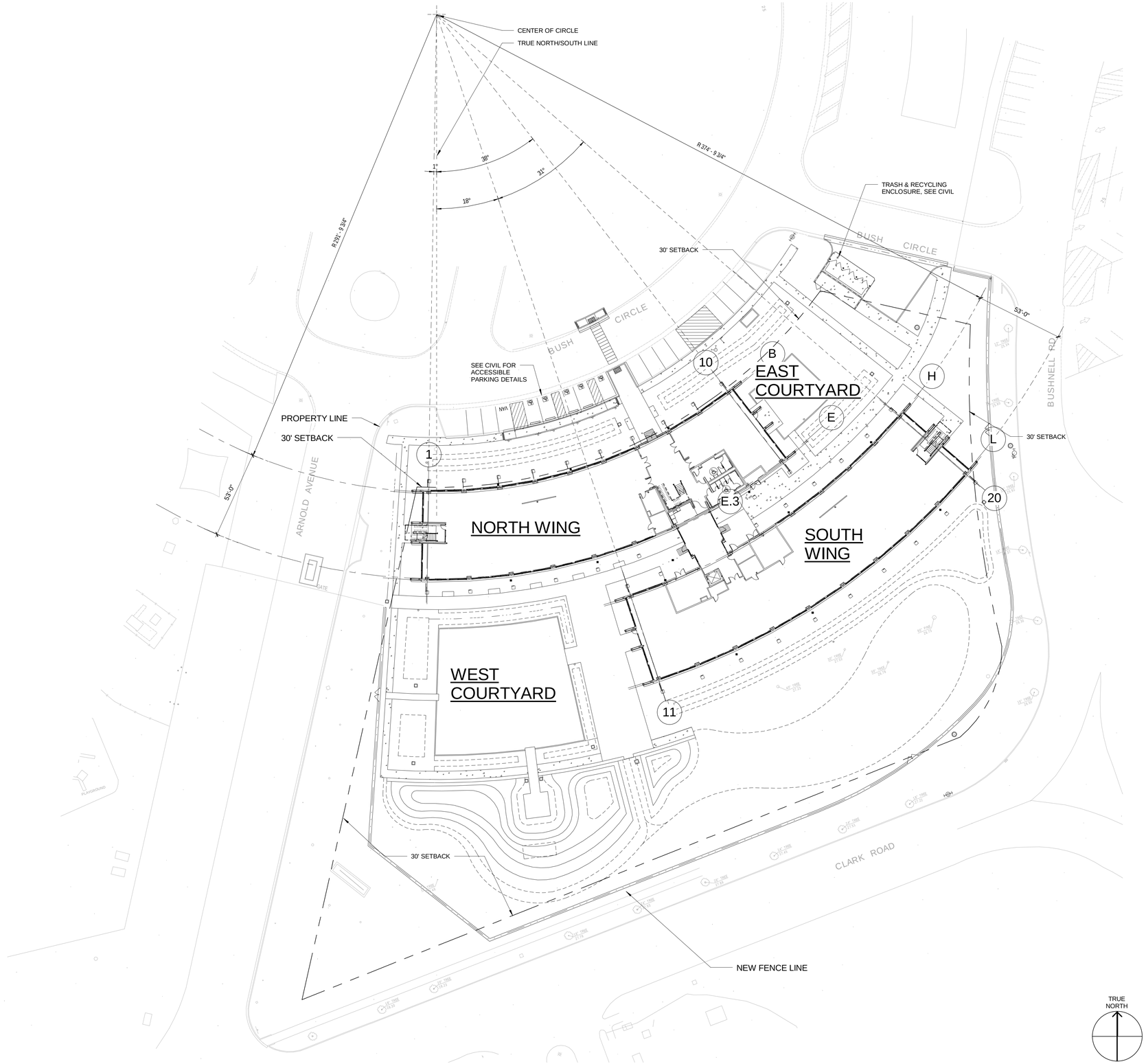
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

ABBREVIATIONS, SYMBOLS & GENERAL NOTES

SIZE	CAGE CODE		REV
D	25307	A232-0800- A001	
SCALE		INDEX	SHEET OF

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TRUE NORTH

SCALE: 1" = 30'-0"

0' 15' 30' 60' 120'

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
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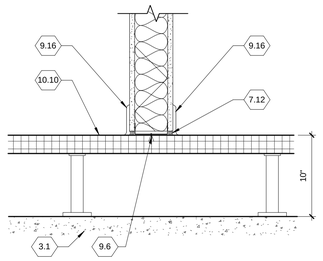
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

ARCHITECTURAL SITE PLAN & COLUMN GRID PLAN

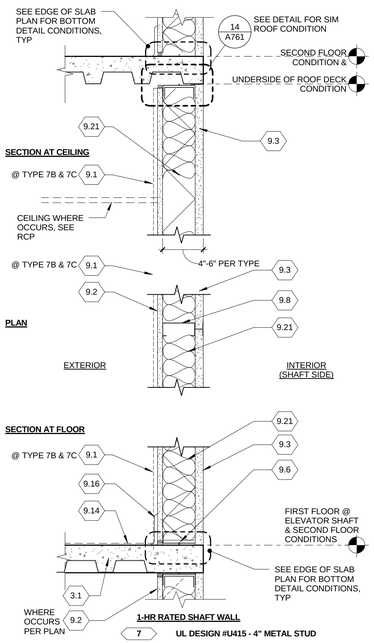
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SCALE	INDEX	SHEET OF	

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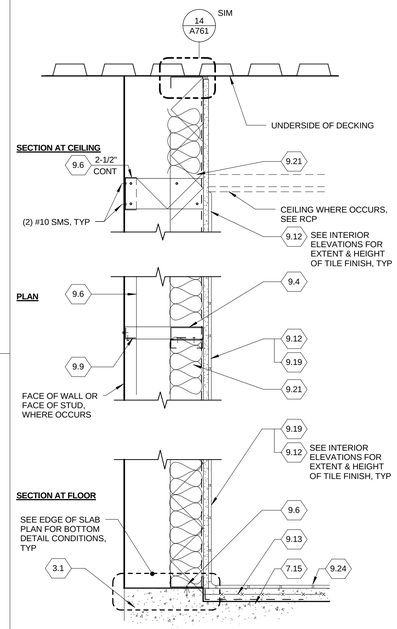
15 WALL TYPE 1G & 3B BOTTOM CONDITION

A101 REF: SCALE: 1 1/2" = 1'-0"



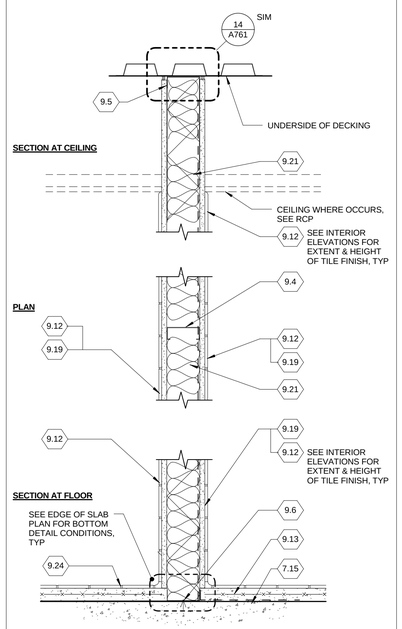
1-HR RATED SHAFT WALL

7	UL DESIGN #U415 - 4" METAL STUD
7A	UL DESIGN #U415 - 6" METAL STUD
7B	UL DESIGN #U415 - 6" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 40)
7C	UL DESIGN #U415 - 4" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 40)
7D	UL DESIGN #U415 - 2-1/2" METAL STUD



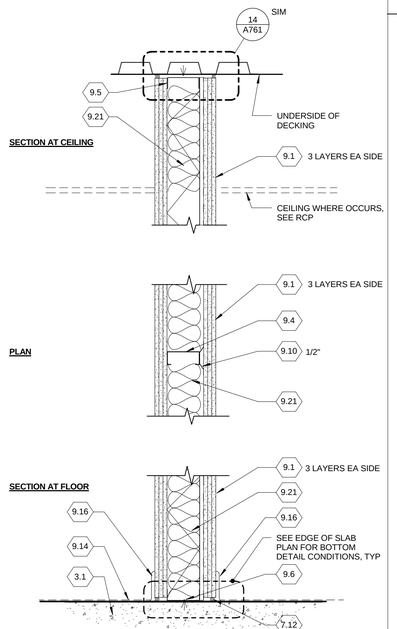
RESTROOM/SHOWER FURRING WALL

6	CERAMIC TILE ONE SIDE - 4" METAL STUD
6A	CERAMIC TILE ONE SIDE - 2-1/2" METAL STUD
6B	CERAMIC TILE ONE SIDE - 6" METAL STUD



RESTROOM/SHOWER WALL

4	CERAMIC TILE BOTH SIDES - 4" METAL STUD
4A	CERAMIC TILE BOTH SIDES - 6" METAL STUD

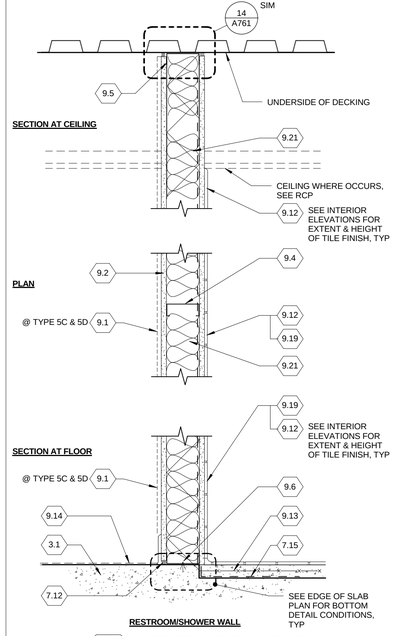


1-HR RATED SOUND WALL @ MECHANCIAL ROOM

2	UL DESIGN #U419 - 4" METAL STUD W/ 1/2" RESILIENT CHANNEL (STC 60)

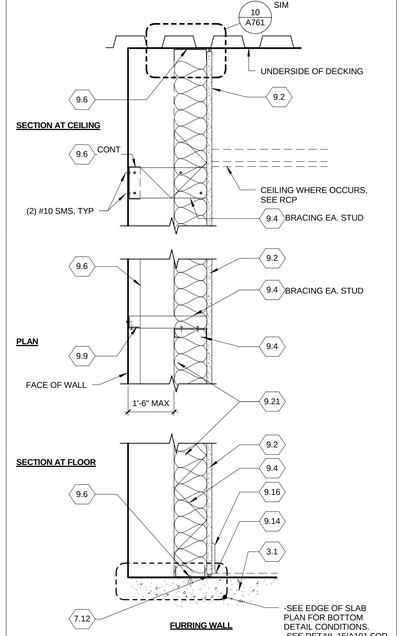
1-HR RATED SHAFT WALL

7	UL DESIGN #U415 - 4" METAL STUD
7A	UL DESIGN #U415 - 6" METAL STUD
7B	UL DESIGN #U415 - 6" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 40)
7C	UL DESIGN #U415 - 4" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 40)
7D	UL DESIGN #U415 - 2-1/2" METAL STUD



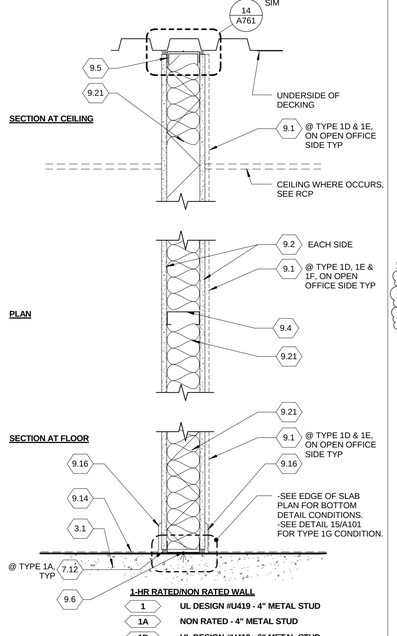
RESTROOM/SHOWER WALL

5	CERAMIC TILE ONE SIDE - 4" METAL STUD
5A	CERAMIC TILE ONE SIDE - 6" METAL STUD
5B	1-HR RATED - CERAMIC TILE ONE SIDE - 6" METAL STUD
5C	CERAMIC TILE ONE SIDE - 6" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 45)
5D	1-HR RATED - CERAMIC TILE ONE SIDE - 6" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 45)



FURRING WALL

3	4" METAL STUD
3A	2-1/2" METAL STUD
3B	4" METAL STUD - INSTALLED OVER RAISED FLOOR



1-HR RATED/NON RATED WALL

1	UL DESIGN #U419 - 4" METAL STUD
1A	NON RATED - 4" METAL STUD
1B	UL DESIGN #U419 - 6" METAL STUD
1C	NON RATED - 6" METAL STUD
1D	NON RATED - 4" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 45)
1E	UL DESIGN #U419 - 6" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 45)
1F	UL DESIGN #U419 - 4" METAL STUD W/ 2 LAYERS 1/2" GWB ONE SIDE IN LIEU OF 5/8" GWB (STC 45)
1G	NON RATED - 4" METAL STUD - INSTALLED OVER RAISED FLOOR

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
- 3.1 CAST IN PLACE CONCRETE
- 3.2 6" CONC HOUSEKEEPING PAD
- 3.3 VAPOR BARRIER
- 3.4 GRANULAR FILL
- 3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
- 5.1 STEEL BEAM
- 5.2 STEEL COLUMN
- 5.3 METAL DECK
- 5.4 STEEL ANGLE
- 5.5 STEEL PLATE
- 5.6 TUBULAR STEEL
- 5.7 STEEL BENT PLATE
- 5.8 STAINLESS STEEL FRAME
- 5.9 OPEN WEB STEEL JOIST
- 5.10 S.S. BOLLARD (6" SQ)
- 5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
- 5.12 CANE DETECTION RAIL
- 5.13 GUARDRAIL
- 5.14 STAINLESS STEEL HANDRAIL
- 5.15 METAL FRAMED STAIR
- 5.16 STEEL CHANNEL
- 5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
- 5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
- 5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
- 5.20 DECORATIVE METAL MESH VINESCREEN
- 5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
- 6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
- 6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
- 6.3 5/8" GLASS MAT FACED GYP SHEATHING
- 6.4 PLASTIC LAMINATE
- 6.5 SOLID-SURFACING MATERIAL COUNTERTOP
- 6.6 (NOT USED)
- 6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
- 7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
- 7.2 PVC ROOFING
- 7.3 MEMBRANE EDGE FASTENER @ 12" O/C
- 7.4 1/4" PROTECTION BOARD
- 7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
- 7.6 BATT INSULATION R=19
- 7.7 PVC MEMBRANE FLASHING
- 7.8 EXTRUDED ALUM TRIM
- 7.9 ALUM FLASHING
- 7.10 FORMED SHEET SS COPING
- 7.11 BELOW GRADE DAMP/WATERPROOFING
- 7.12 SEALANT WITH BACKER ROD
- 7.13 20 GA GALVANIZED SPLASH PAN
- 7.14 DOWN SPOUT
- 7.15 WATERPROOFING MEMBRANE
- 7.16 INSULATED METAL PANEL CLADDING
- 7.17 PVC ROOF SEISMIC JOINT COVER
- 7.18 EXTERIOR WALL SEISMIC JOINT COVER
- 7.19 INTERIOR WALL SEISMIC JOINT COVER
- 7.20 CEILING SEISMIC JOINT COVER
- 7.21 FIRESTOPPING
- 7.22 SAND COATED ROOF WALKWAY
- 7.23 METAL SPANDREL PANEL (INSULATED)
- 7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
- 7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
- 7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
- 7.27 FLOOR SEISMIC JOINT COVER
- 7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
- 7.29 METAL PANEL SOFFIT
- 7.30 1" RIGID INSULATION BOARD
- 7.31 WATERPROOF TRAFFIC COATING
- 7.32 COMPRESSION SEAL
- 7.33 SILICONE SEALANT
- 7.34 NEOPRENE SPACER (BLACK).
- 7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
- 7.36 1/2" FOIL-BACKED RIGID INSULATION
- 7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
- 8.1 DOOR & FRAME
- 8.2 MOTORIZED OPERABLE WINDOW
- 8.3 MANUAL OPERABLE WINDOW
- 8.4 AUTOMATIC DOOR BOTTOM
- 8.5 THRESHOLD
- 8.6 GLAZED ALUM CURTAIN WALL SYSTEM
- 8.7 1" INSULATED GLAZING
- 8.8 FRITTED GLAZING
- 8.9 SPANDREL GLAZING
- 8.10 VISION GLASS (SAFETY WHERE REQUIRED)
- 8.11 (NOT USED)
- 8.12 AUTOMATIC ENTRANCE DOOR
- 8.13 SKYLIGHT
- 8.14 WEATHERSTRIPPING
- 8.15 MTL SECURITY GATE
- 8.16 DOOR PULL
- 8.17 AUTOMATIC DOOR OPERATOR
- 8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

NOTE: WHERE MULTIPLE LAYERS OF GWB ARE REQUIRED ON THE SAME SIDE OF A PARTITION, THE CONTRACTOR MAY SUBSTITUTE ONE LAYER OF SOUND INSULATING TYPE OF GYPSUM BOARD FOR THE FIRST TWO LAYERS OF GWB. THE SOUND INSULATING TYPE GYPSUM BOARD SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S WRITTEN INSTRUCTIONS FOR NOISE RATED ASSEMBLIES. A

DIVISION 09 - FINISHES
- 9.1 1/2" GWB TYPE X
- 9.2 5/8" GWB TYPE X
- 9.3 1" GWB SHAFT LINER
- 9.4 20 GA MTL STUD @ 16" O/C
- 9.5 SLOTTED SLIP TRACK
- 9.6 METAL STUD TRACK
- 9.7 COLD FORMED FURRING CHANNEL
- 9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
- 9.9 FRAMING ANGLE, MIN 20 GA GALV
- 9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
- 9.11 SHAFT J RUNNER
- 9.12 CERAMIC TILE
- 9.13 REINFORCED MORTAR SETTING BED
- 9.14 SCHEDULED FLOORING
- 9.15 SUSPENDED GYP BOARD CEILING SYSTEM
- 9.16 SCHEDULED WALL BASE
- 9.17 PAINT
- 9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
- 9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
- 9.20 3/4" RECLAIMED WOOD FLOORING
- 9.21 SOUND ATTENUATION BLANKET
- 9.22 ACOUSTICAL INSULATION 3" (UON)
- 9.23 SUSPENDED ACOUSTICAL CEILING
- 9.24 STONE TILE
- 9.25 RECLAIMED WOOD WALL PANEL
- 9.26 METAL COATINGS AND SEALER
- 9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
- 9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
- 10.1 TOILET PARTITION
- 10.2 (NOT USED)
- 10.3 METAL LOCKER
- 10.4 FIRE EXTINGUISHER CABINET
- 10.5 DOOR STOP
- 10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
- 10.7 VINE SCREEN SYSTEM
- 10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
- 10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
- 10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
- 10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
- 11.1 MOTORIZED PROJECTION SCREEN
- 11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
- 12.1 MOTORIZED WINDOW SHADE
- 12.2 SYSTEM FURNITURE, NIC
- 12.3 ENTRANCE FLOOR MAT & FRAME
- 12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
- 13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
- 14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
- 21.1 FIRE SPRINKLER HEAD
- 21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
- 22.1 ROOF DRAIN
- 22.2 NOT USED
- 22.3 VENT THROUGH ROOF
- 22.4 ELECTRIC WATER COOLER
- 22.5 KITCHEN SINK
- 22.6 SERVICE SINK
- 22.7 FLOOR DRAIN
- 22.8 FILTERED WATER SYSTEM FAUCET
- 22.9 DUAL FLUSH TOILET
- 22.10 HIGH EFFICIENCY TOILET
- 22.11 LOW CONSUMPTION URINAL
- 22.12 COUNTERTOP SINK
- 22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
- 22.14 HAND SHOWER SET WITH SLIDE BAR
- 22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
- 23.1 BOILER FLUE
- 23.2 DUCT
- 23.3 PERIMETER HYDRONIC HEATER
- 23.4 FIRE DAMPER
- 23.5 RADIANT CEILING PANEL
- 23.6 MECHANICAL SHAFT OPENING
- 23.7 RADIANT FLOOR SLAB SYSTEM
- 23.8 MECHANICAL PIPING
- 23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
- 26.1 LIGHT FIXTURE
- 26.2 CARD READER
- 26.3 PHOTOVOLTAIC INVERTER
- 26.4 POWER - DUPLEX
- 26.5 POWER - QUAD
- 26.6 POWER/DATA OUTLET COMBINATION
- 26.7 SWITCH
- 26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
- 28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
- 32.1 CONCRETE PAVING

PROJECT STATUS

PROPOSAL SET 07/23/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	07/01/09	ADDED NOTE	FB

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

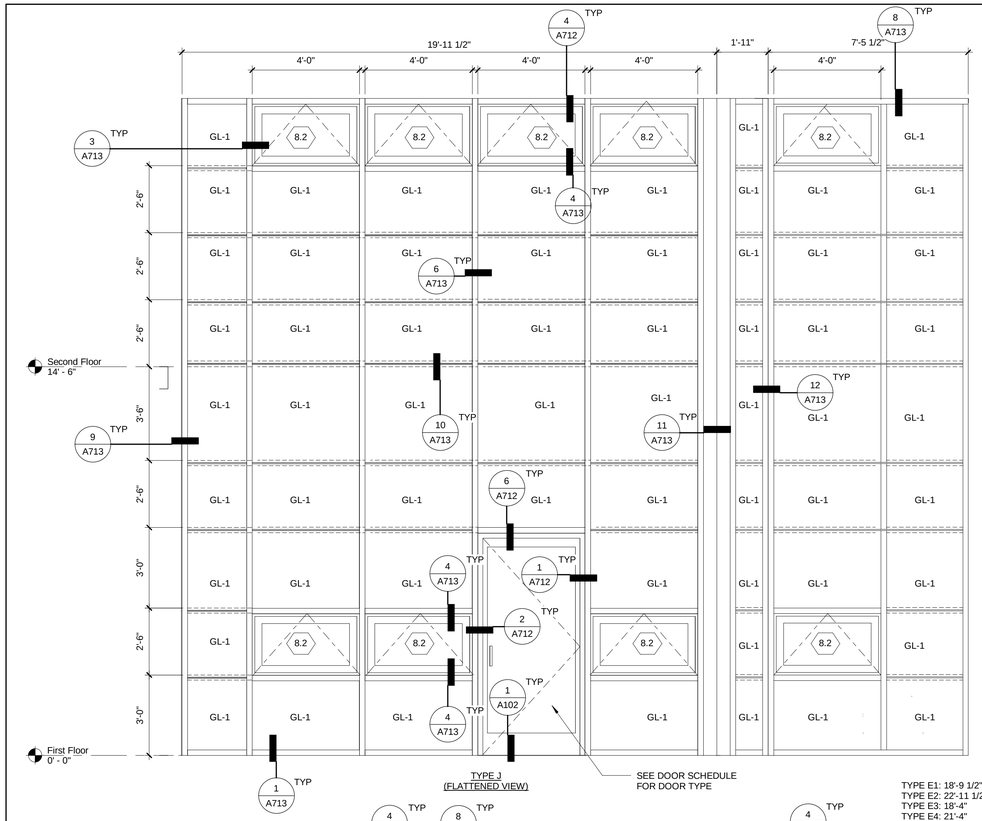
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

PARTITION TYPES & DETAILS

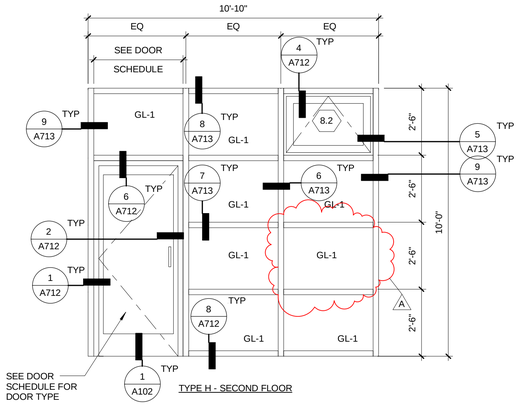
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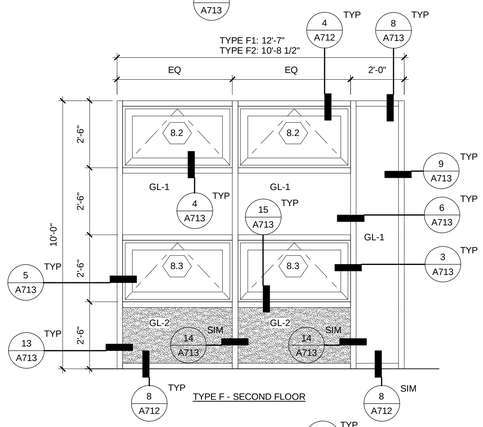


TYPE J
(FLATTENED VIEW)

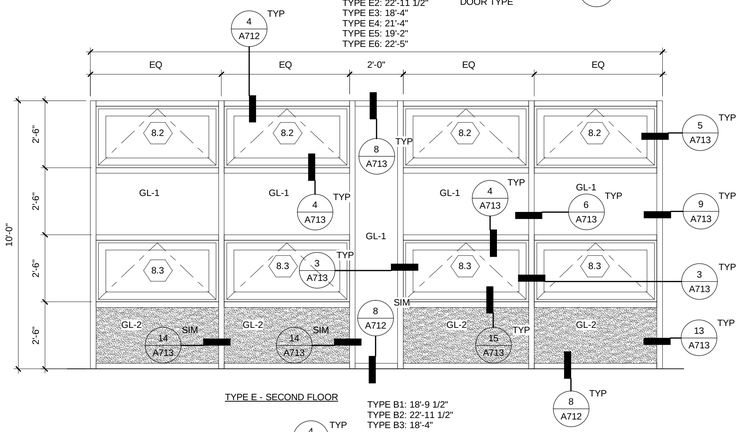
TYPE E1: 18'-9 1/2"
TYPE E2: 22'-11 1/2"
TYPE E3: 18'-4"
TYPE E4: 21'-4"
TYPE E5: 19'-2"
TYPE E6: 22'-5"



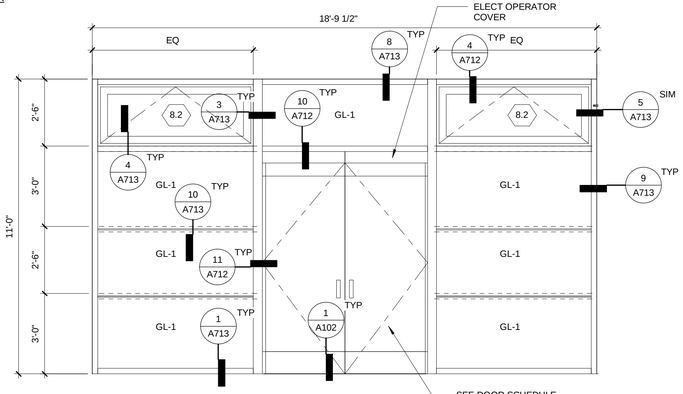
TYPE H - SECOND FLOOR



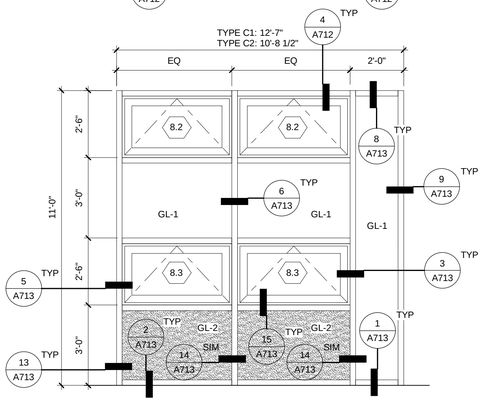
TYPE F - SECOND FLOOR



TYPE E - SECOND FLOOR

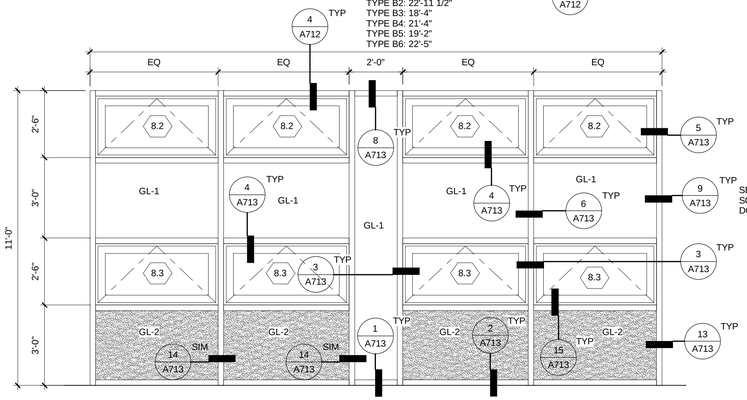


TYPE D - FIRST FLOOR

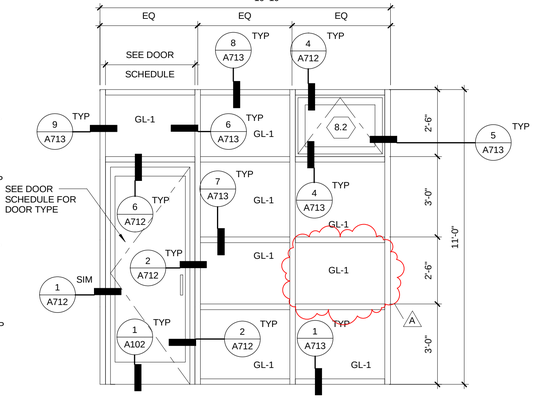


TYPE C - FIRST FLOOR

TYPE B1: 18'-9 1/2"
TYPE B2: 22'-11 1/2"
TYPE B3: 18'-4"
TYPE B4: 21'-4"
TYPE B5: 19'-2"
TYPE B6: 22'-5"



TYPE B - FIRST FLOOR



TYPE A - FIRST FLOOR

GENERAL NOTES - WINDOWS

GL-1 VISION

GL-2 SPANDREL GLASS

8.2 MOTORIZED OPERABLE WINDOW, GL-1
PROVIDE SINGLE CHAIN FOR WINDOWS UP TO 4'-0" WIDE & DUAL CHAINS FOR WINDOWS WIDER THAN 4'-0"

8.3 MANUAL OPERABLE WINDOW, GL-1

NOTES:

1. PROVIDE SAFETY GLAZING AT HAZARDOUS LOCATIONS PER CBC SECTION 2406.3

2. VERIFY ALL CURTAIN WALL DIMENSIONS IN FIELD.

3. FOR ALUMINUM AND GLASS TYPES, SEE FINISH SCHEDULE.

4. FOR ALL CURTAIN WALL TYPES EXCEPT TYPE D, USE PROFILE 3 (6"); FOR CURTAIN WALL TYPE D, USE PROFILE 4 (7 1/2").

5. CURTAIN WALL & WINDOW DETAIL CALLOUTS TYP FOR ALL CURTAIN WALL TYPES, UON

SCALE: 3/8" = 1'-0"

0' 1' 3' 7' 10'-8"

PROJECT STATUS

BID SET 05/26/09

MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REMOVED LOWER OPERABLE WINDOWS AT CURTAIN WALL TYPES A AND H	JG

		DATE
DRAWN	J MASCARINAS	
DESIGNED	R PRADHAN	
CHECKED	W JOFFRION	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

Ames Research Center
Moffet Field, California

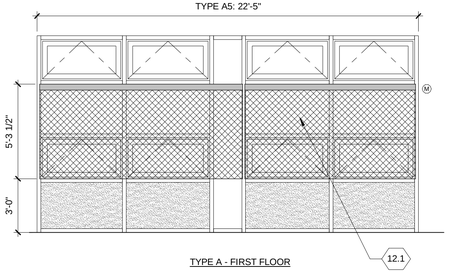
N232 COLLABORATIVE SUPPORT FACILITY

CURTAIN WALL TYPES

SIZE	CAGE CODE		REV
D	25307	A232-0800- A103	A
SCALE	INDEX	SHEET	OF

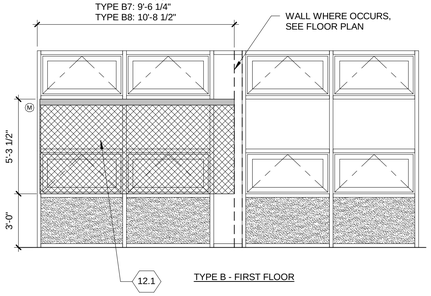
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TYPE A1: 18'-9 1/2"
TYPE A2: 22'-11 1/2"
TYPE A3: 18'-4"
TYPE A4: 19'-2"
TYPE A5: 22'-5"



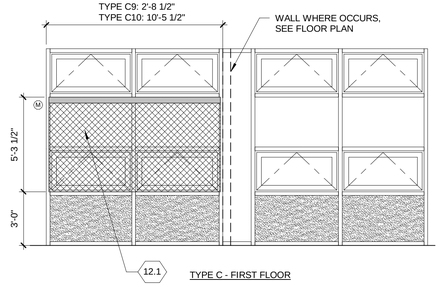
TYPE A - FIRST FLOOR

TYPE B1: 9'-9"
TYPE B2: 11'-10"
TYPE B3: 11'-0 1/4"
TYPE B4: 12'-7"
TYPE B5: 9'-11 1/4"
TYPE B6: 11'-6 3/4"
TYPE B7: 9'-6 1/4"
TYPE B8: 10'-8 1/2"



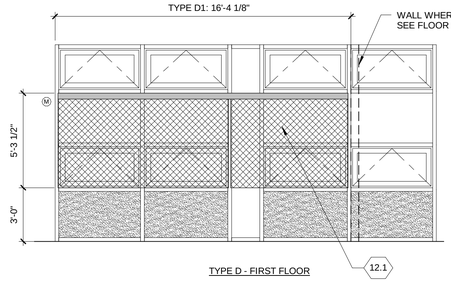
TYPE B - FIRST FLOOR

TYPE C1: 8'-7 1/4"
TYPE C2: 10'-8 1/4"
TYPE C3: 9'-10 1/2"
TYPE C4: NOT USED
TYPE C5: 8'-9 1/2"
TYPE C6: 10'-5"
TYPE C7: 8'-4 1/2"
TYPE C8: 7'-4 1/2"
TYPE C9: 2'-8 1/2"
TYPE C10: 10'-5 1/2"



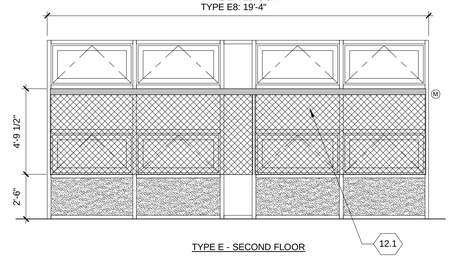
TYPE C - FIRST FLOOR

TYPE D1: 16'-4 1/8"



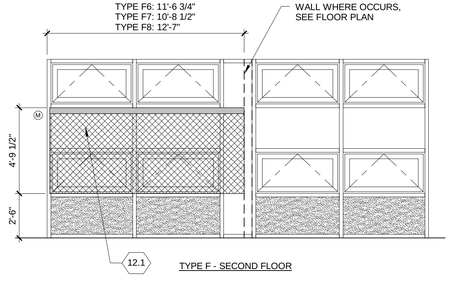
TYPE D - FIRST FLOOR

TYPE E1: 18'-9 1/2"
TYPE E2: 22'-11 1/2"
TYPE E3: 18'-4"
TYPE E4: 21'-4"
TYPE E5: 19'-2"
TYPE E6: 22'-5"
TYPE E7: 19'-3 3/4"
TYPE E8: 19'-4"



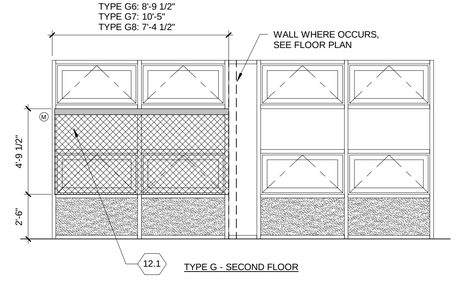
TYPE E - SECOND FLOOR

TYPE F1: 9'-9"
TYPE F2: 11'-10"
TYPE F3: 9'-6 1/4"
TYPE F4: 11'-0 1/4"
TYPE F5: 9'-11 1/4"
TYPE F6: 11'-6 3/4"
TYPE F7: 10'-8 1/2"
TYPE F8: 12'-7"



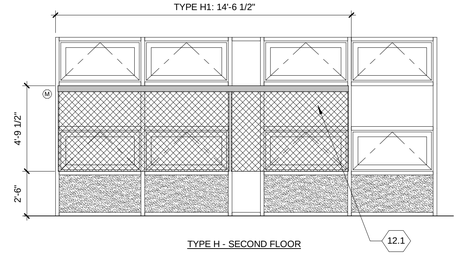
TYPE F - SECOND FLOOR

TYPE G1: 8'-7 1/4"
TYPE G2: 10'-8 1/4"
TYPE G3: 8'-4 1/2"
TYPE G4: 9'-10 1/2"
TYPE G5: NOT USED
TYPE G6: 8'-9 1/2"
TYPE G7: 10'-5"
TYPE G8: 7'-4 1/2"



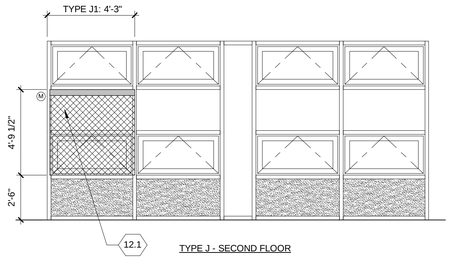
TYPE G - SECOND FLOOR

TYPE H1: 14'-6 1/2"



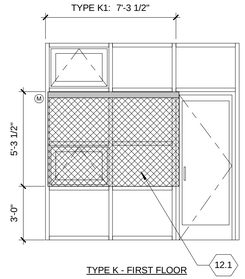
TYPE H - SECOND FLOOR

TYPE J1: 4'-3"



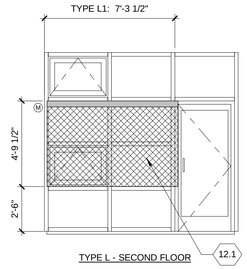
TYPE J - SECOND FLOOR

TYPE K1: 7'-3 1/2"

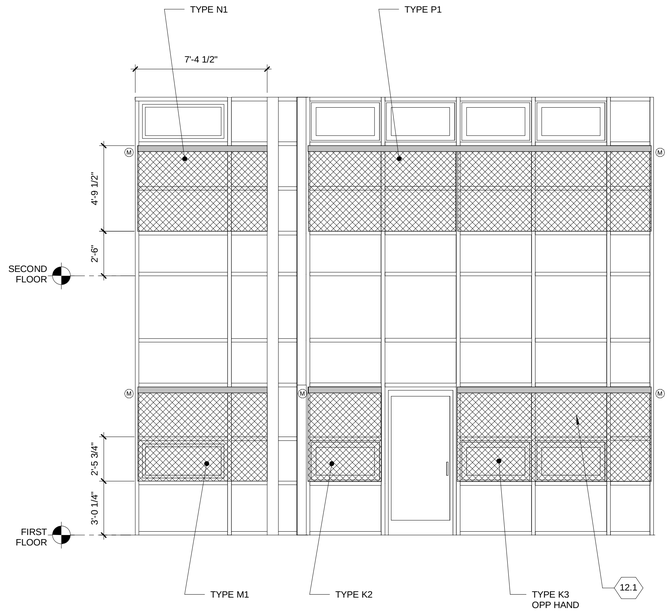


TYPE K - FIRST FLOOR

TYPE L1: 7'-3 1/2"



TYPE L - SECOND FLOOR



(FLATTENED VIEW)

GENERAL NOTES - WINDOW SHADES

12.1 MOTORIZED WINDOW SHADE

XX WINDOW SHADE TYPE TAG

M MOTOR (HOUSED WITHIN ROLLER TUBE)

LEGEND

ELEVATION- EXTENT OF WINDOW SHADES

PLAN- LOCATION OF WINDOW SHADES

FUTURE TENANT IMPROVEMENT WALLS SHOWN DASHED

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. SEE SHEET A105 FOR FINISH SCHEDULE FOR MATERIALS AND COLORS.
3. SEE DETAIL 8/A802 FOR TYPICAL INSTALATION.

SCALE: 1/4" = 1'-0"

0' 2' 4' 8' 16'

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

WINDOW SHADE TYPES

SIZE	CAGE CODE		REV
D	25307	A232-0800- A104	
SCALE	INDEX	SHEET OF	

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ROOM FINISH SCHEDULE

RM #	ROOM NAME	FLOOR	BASE	WALL FINISH NORTH	WALL FINISH EAST	WALL FINISH SOUTH	WALL FINISH WEST	CEILING FINISH	CEILING HEIGHT	REMARKS
First Floor										
101	NORTH LOBBY	WD-1	B-1	P-1	P-1	P-1 A	P-1 A	GWB-1	11' - 0"	3
102	OPEN OFFICE	CPT-1 & 2	B-2	P-1	P-1	P-1	P-1	-	11' - 0"	1
103	OPEN OFFICE	CPT-1 & 2	B-2	P-1	P-1	P-1	P-1	-	11' - 0"	1
104	SOLAR HOT WATER HEATER	SEA-1	-	P-1	P-1	P-1	P-1	-	11' - 0"	2
105	MEN	CTF-1	CTW-1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	GWB-1	9' - 0"	
105A	CLOSET	VCT-1	B-2	P-1	P-1	P-1	P-1	GWB-1	8' - 0"	
106	WOMEN	CTF-1	CTW-1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	GWB-1	9' - 0"	
107	ELECTRICAL	SEA-1	-	P-1	P-1	P-1	P-1	-	11' - 0"	2
108	COMM	VCT-1	B-2	P-1	P-1	P-1	P-1	-	11' - 0"	2
109	LUNCH ROOM	SEA-1	B-1	P-1 A	P-1 A	P-1 A	P-1 A	GWB-1	9' - 0"	3
110	SOUTH LOBBY	WD-1	B-1	P-1	P-1	P-1 A	P-1 A	GWB-1	11' - 0"	3
111	JAN/ RECEIVING	VCT-2	B-2	P-1/WFP-1	P-1/WFP-1	P-1	P-1	GWB-1	11' - 0"	2
112	OPEN OFFICE	CPT-1	B-2	P-1	P-1	P-1	P-1	-	11' - 0"	1
113	TEL/DATA	VCT-1	B-2	P-1	P-1	P-1	P-1	-	11' - 0"	2
114	ELEC.	SEA-1	-	P-1	P-1	P-1	P-1	-	11' - 0"	2
115	ELEV M.R.	SEA-1	-	P-1	P-1	P-1	P-1	GWB-1	11' - 0"	2
116	MECHANICAL	SEA-1	-	P-1	P-1	P-1	P-1	GWB-1	11' - 0"	2
Second Floor										
201	NORTH LOBBY	WD-1	B-1	P-1	P-1	P-1 A	P-1 A	GWB-1	10' - 0"	3
202	OPEN OFFICE	CPT-1 & 2	B-2	P-1	P-1	P-1	P-1	-	10' - 4"	1
203	OPEN OFFICE	CPT-1 & 2	B-2	P-1	P-1	P-1	P-1	-	10' - 4"	1
205	MEN	CTF-1	CTW-1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	GWB-1	9' - 0"	
205A	MENS SHOWER	CTF-1	CTW-1	CTW-1	CTW-1	CTW-1	CTW-1	GWB-1	9' - 0"	
206	WOMEN	CTF-1	CTW-1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	CTW-1 / P1	GWB-1	9' - 0"	
206A	WOMENS SHOWER	CTF-1	CTW-1	CTW-1	CTW-1	CTW-1	CTW-1	GWB-1	9' - 0"	
207	ELECTRICAL	SEA-1	-	P-1	P-1	P-1	P-1	-	10' - 4"	2
209	LUNCH ROOM	SEA-1	B-1	P-1	P-1	P-1	P-1	GWB-1	10' - 0"	
210	HALLWAY	WD-1	B-1	P-1	P-1	P-1 A	P-1 A	GWB-1	10' - 0"	3
211	JAN	VCT-1	B-2	P-1/WFP-1	P-1/WFP-1	P-1	P-1	GWB-1	10' - 4"	2
212	OPEN OFFICE	CPT-1	B-1	P-1	P-1	P-1	P-1	-	10' - 4"	1
213	TEL/DATA	VCT-1	B-2	P-1	P-1	P-1	P-1	-	10' - 4"	2
215	ELECTRICAL	VCT-1	-	P-1	P-1	P-1	P-1	-	10' - 4"	2

Grand total: 31

A

SCHEDULE COMMENTS LEGEND

1. CEILING HEIGHT REPRESENTS UNDERSIDE OF CHILLED RADIANT CEILING PANELS
2. EXPOSED CEILING TO UNDERSIDE OF DECK A

INTERIOR FINISH/COLOR LEGEND X-1

CARPET (CPT) - **BID OPTION #6**
CPT-1 MFR: INTERFACE — STYLE: "REPURPOSE" / COLOR: PEBBLECLOTH / LOCATION: OPEN OFFICE

CPT-2 MFR: INTERFACE — STYLE: "OUTSIDE THE LINES" - BASELINE / COLOR: STONE / LOCATION: OPEN OFFICE (CENTRAL AISLE)

CERAMIC / GLASS TILE (CTF-FLOOR / CTW-WALL)
CTF-1 MFR: ASN — COLOR: BLACK DIAMOND FLAMED / SIZE: 12" X 24" / THICKNESS: 1/2" / STYLE: SLIP-RESISTANT / LOCATION: RESTROOM & SHOWER A

CTF-2 MFR: STRATASTONE — STYLE: STANDING/RAISED PEBBLE FLOOR TILE / COLOR: DARK OCEAN PEBBLE or CONTRASTING TO SURROUNDING FINISHED WOOD FLOOR / PEBBLE HEIGHT: 3/8"MIN TO 5/8" MAX. / PEBBLE WIDTH: 1"MIN TO 2.5" MAX. / GROUT WIDTH AND COLOR: 1/8", GREY / LOCATION: GROUND FLOOR AT STAIR 1

CTW-1 MFR: DALTILE — STYLE: MODERN DIMENSIONS WALL TILE / COLOR: "BISQUIT", MATTE / FIELD SIZE: 2 1/8"X 8 1/2" / BASE SIZE: 4 1/4" X 8 1/2" / LOCATION: RESTROOMS AND SHOWERS

CTW-2 MFR: DALTILE — NOT USED

CTW-3 MFR: ITALICS — STYLE: CONTEMPORANEA / COLOR: GREEN BLEND / SIZE: 1"X1" / LOCATION: LUNCHROOM

CTW-4 MFR: TILESHOP — STYLE: VETRISSIMO LE ONDE / COLOR: 103 MIST / SIZE: 2" X 6" / LOCATION: RESTROOM & SHOWER WALLS

CTW-5 MFR: TILESHOP — STYLE: VETRISSIMO SATINATO / COLOR: 218 HONEY / SIZE: 2" X 6" / LOCATION: RESTROOM & SHOWER WALLS

CTW-5 MFR: TILESHOP — STYLE: VETRISSIMO SATINATO / COLOR: 207 MUSHROOM / SIZE: 2" X 6" / LOCATION: RESTROOM & SHOWER WALLS

CONCRETE COLOR (INTEGRAL)
CCR-1 MFR: DAVIS COLOR — COLOR: NOT USED

EXPOSED CONC. FLOOR- CONC. SEALER (SEA)
SEA-1 MFR: VEXCON — STYLE: STARSEAL / LOCATION: STRUCTURAL CONC. SLAB, LUNCHROOMS, STAIRS.

GLASS PANELS IN-FILL (GLF)
GL-5 MFR: HDI RAILING — COLOR: MONOLITHIC, CLEAR, TEMP / LOCATION: STAIR #1 AND FLOOR 2 BRIDGE

GL-4 MFR: PPG — COLOR: STARPHIRE, CLEAR, POLISHED BOTH SIDES / STYLE: SQUARE WIRES / SIZE: 6" X 14", 100 SQ. INCHES, MAXIMUM / THICKNESS: 6.0mm A

GYPSUM BOARD CEILING (GWB)
GWB-1 MFR: G-P — STYLE: 5/8", TYP. TYPE 'X' WHERE INDICATED. / LOCATION: SEE DRAWINGS FOR LOCATION AND TYPE.

METAL PANEL CLADDING S (MC)
MC-1 MFR: — STYLE: STAINLESS STEEL / COLOR: BRUSHED / LOCATION: STAIR #1 AND FLOOR 2 BRIDGE EDGES

PAINT (P)
P-1 MFR: BENJAMIN MOORE — STYLE: ECO-SPEC INTERIOR LATEX / COLOR: DISTANT GRAY / FINISH: EGGSHELL / LOCATION: TYPICAL, UON.

P-2 MFR: BENJAMIN MOORE — STYLE: ECO-SPEC INTERIOR LATEX / COLOR: DISTANT GRAY / FINISH: FLAT / LOCATION: GYP. BD. CEILINGS

PLASTIC LAMINATES (PLM)
PLM-1 MFR: ARPA — COLOR & PATTERN: 2550 IRIDESCENT PEWTER / FINISH: ERRE / FROSTED GLASS DOORS / LOCATION: UPPER CABINETS

PLM-2 MFR:ARPA — COLOR & PATTERN: 2550 IRIDESCENT PEWTER / FINISH: GHIBLI / LOCATION: LOWER CABINETS

PLM-3 MFR:ARPA — NOT USED.

PLM-4 MFR: ARPA — COLOR & PATTERN: 2550 IRIDESCENT PEWTER / FINISH: ERRE / LOCATION: SHOWER SIDE OF SHOWER DOOR.

SOLID SURFACE (SSU)
SSU-1 MFR: ICESTONE — COLOR: "AMBER PEARL" / LOCATION: RESTROOMS

SSU-2 MFR: ICESTONE — STYLE & COLOR : "STORM CLOUD" / LOCATION: LUNCHROOMS

TOILET PARTITION (TP)
TP-1 MFR: — STYLE: FLOOR MOUNTED / TYPE: POWER-COATED / COLOR: MATCH WALL PAINT / LOCATION: RESTROOMS, TYP. U.O.N.

TP-2 MFR: — STYLE: WALL MOUNTED URINAL PARTITION / TYPE: POWDER-COATED / COLOR: MATCH WALL PAINT / LOCATION: MENS RESTROOM

WALL BASE (B)
B-1 MFR: — RECLAIMED WOOD / HEIGHT: 2-1/2" / LOCATION: LOBBIES AND HALLWAYS

B-2 MFR: JOHNSONITE — COLOR: CHARCOAL / HEIGHT: 4" / LOCATION: AT VCT, SEA

WALL PANELS / FIBRE-GLASS PANEL (WFP)
WFP-1 MFR: MARLITE — STYLE: STANDARD FRP , SMOOTH / COLOR: P151, LIGHT GREY / LOCATION: JANITORS CLOSET

WFP-2 — THIS WALL TYPE DELETED BY AMENDMENT / SUBSTITUTE P-1 FINISH A

WOOD FLOORING (WD)
WD-1 — GOVERNMENT-FURNISHED RECLAIMED WOOD / FINISH: SAND, APPLY 3 COATS CLEAR, SATIN / LOCATION: LOBBY AND HALLWAYS

WOOD VENEER (WV)
WV-1 MFR: PLYBOO — STYLE: FLAT GRAIN VENEER / COLOR: AMBER / LOCATION: LOBBY AND HALLWAY

WINDOW SHADING DEVICES (WSD)
WSD-1 MFR: MECHOSHADE — STYLE: ECO-VEIL, 5% OPENING, TYP. / COLOR: WHITE, TYP. / LOCATION: SEE WINDOW SHADE SCHEDULE

LINORLEUM FLOORING
VCT-1 MFR: FORBO — STYLE: MARMOLEUM / COLOR: 2629 EIGER / SIZE: 12" X 12" MINIMUM / LOCATION: COMM & DATA/TEL ROOMS. CUT TO FIT ACCESS FLOOR TILES A

EXTERIOR FINISH/COLOR LEGEND X-1

EXTERIOR FACADE PANELS (EP)
EP-1 MFR: CENTRIA — STYLE: DIMENSION SERIES / COLOR: SILVER GRAY (22126), 3 COAT / SURFACE: SMOOTH

EP-2 MFR: CENTRIA — STYLE: DIMENSION SERIES / COLOR: SILVER GRAY (22126), 3 COAT / SURFACE: STRIATED

ALUMINUM WINDOW/DOOR FRAMES (AL)
AL-1 MFR: KAWNEER — CLEAR ANODIC FINISH PER SPECIFICATIONS A

GLASS (GL)
GL-1 MFR: PPG — STYLE: SOLARBAN 70XL SOLAR CONTROL LOW-E GLASS (1" INSULATING GLASS UNIT) / COLOR: STARPHIRE, CLEAR

GL-2 MFR: PPG — STYLE: STARFIRE, / TYPE: SPANDREL GLASS / CERAMIC FRIT / GLAZING COLOR: CLEAR / FRIT COLOR: TBD

GL-3 MFR: OLDCASTLE — STYLE: MONOLITHIC, LAMINATED / COLOR: CLEAR / FRIT: DOTS, 40% COVERAGE / LOCATION: EXTERIOR GLASS CANOPIES

HORIZONTAL FIXED SUNSCREEN (HS) - **BID OPTION #3A**
HS-1 MRF: MCNICHOLS — TYPE: ALUM. GRATING GAL 19-SG-4 / SIZE: 1.5" DEEP X 3/16", LOCKED BY SWAGING / LOCATION: 2ND FLOOR LEVEL

HORIZONTAL FIXED SUNSCREEN (HS) - **BID OPTION #3B**
HS-2 MRF: CENTRIA — TYPE: ECOSCREEN PERFORATED SCREEN / COLOR: STAINLESS STEEL PERFORATED PANEL / OPENING: 40 PERCENT

LOUVERS (LV)
LV-1 MFR: C/S GROUP — TYPE: CONVENTIONAL / MODEL: A6100 / SIZE: 2" / COLOR: MATCH METAL WALL PANEL / LOCATION: EXTERIOR WALL AND DOORS. SEE ELEVATIONS

METAL PANELS IN-FILL (MTF)
MTF-1 MFR: HDI — STYLE: CIRRUS / OPENING: 2" X 2" SQUARE, MAXIMUM) A / LOCATION: EXTERIOR STAIR GUARDRAIL PANELS

PAINT (P)
P-3 MFR: TNEMEC — COLOR: 1009 GRAY / LOCATION: STRUCTURAL STEEL

P-4 MRF:BENJAMIN MOORE — COLOR: MATCH ADJACENT WALL COLOR.

STAINLESS STEEL GRATING (SSG)
SSG-1 MFR: KADEE — STYLE: KD- 58, SS GRATING / LOCATION: ENTRY DOORS (OUTSIDE)

VERTICAL LOUVER AIRFOIL SHADE (VS) - **BID OPTION #2**
VS-1 MFR: C/S GROUP — TYPE: BLADE SUN CONTROL / SHAPE: AIRFOIL / COLOR: MATCH ALUM. CURTAINWALL SYSTEM

PROJECT STATUS
PROPOSAL SET 07/23/09

MARK	DATE	DESCRIPTION	INITIAL
A	07/01/09	SUBSTITUTED PT-1 FOR WFP-2, REVISED CTF-2, VCT-1, AL-1, GL-4 & MTF-1, REVISED TABLE LEGEND	

DRAWN	S MOSHGGOU	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

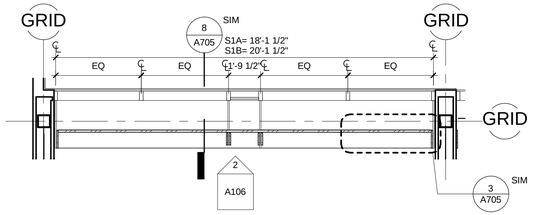
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

FINISH SCHEDULE

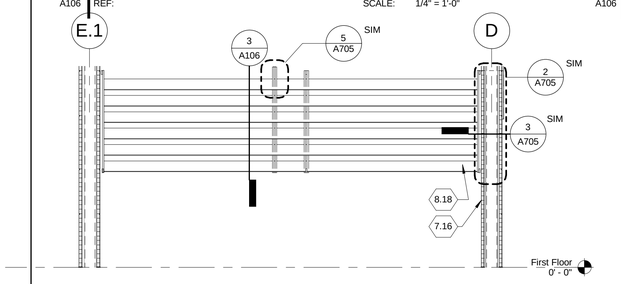
SIZE	CAGE CODE		REV
D	25307	A232-0800- A105	A
SCALE	INDEX	SHEET OF	

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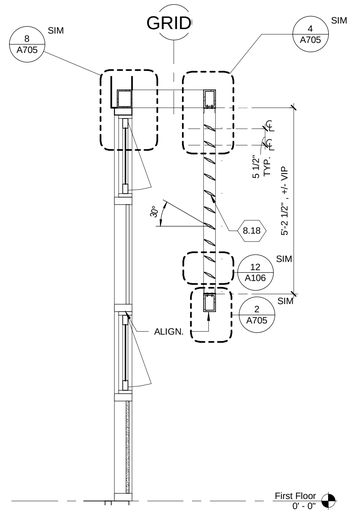
1 SHADE TYPE S1- PLAN

A106 | REF: | SCALE: 1/4" = 1'-0"



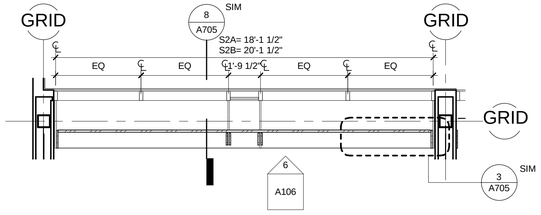
2 SHADE TYPE S1- ELEVATION

A106 | REF: A106 | SCALE: 1/4" = 1'-0"



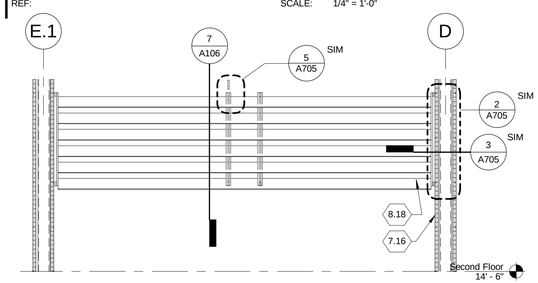
3 SHADE TYPE S1- SECTION

A106 | REF: A106 | SCALE: 1/2" = 1'-0"



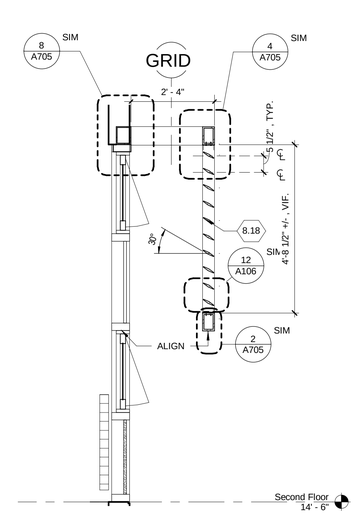
5 SHADE TYPE S2- PLAN

A106 | REF: | SCALE: 1/4" = 1'-0"



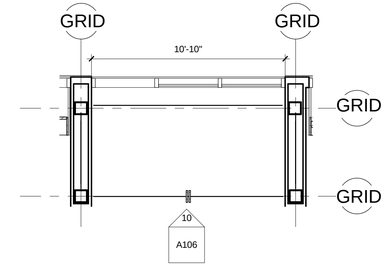
6 SHADE TYPE S2- ELEVATION

A106 | REF: A106 | SCALE: 1/4" = 1'-0"



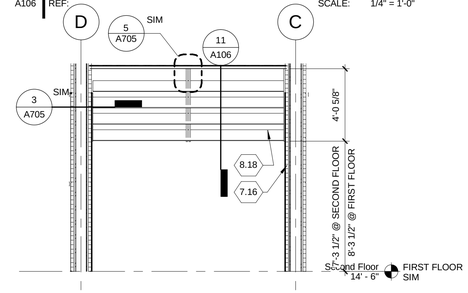
7 SHADE TYPE S2- SECTION

A106 | REF: A106 | SCALE: 1/2" = 1'-0"



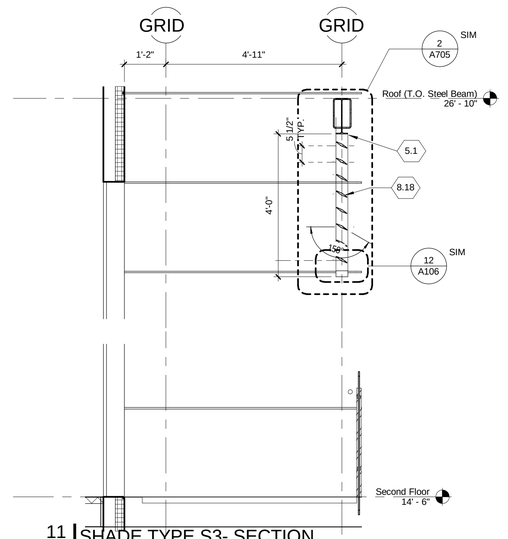
9 SHADE TYPE S3- PLAN

A106 | REF: | SCALE: 1/4" = 1'-0"



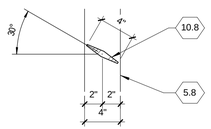
10 SHADE TYPE S3- ELEVATION

A106 | REF: A106 | SCALE: 1/4" = 1'-0"



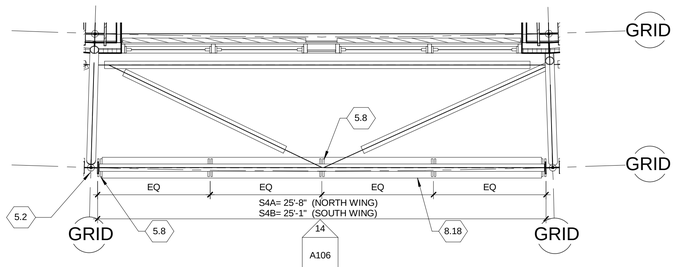
11 SHADE TYPE S3- SECTION

A106 | REF: A106 | SCALE: 1/2" = 1'-0"



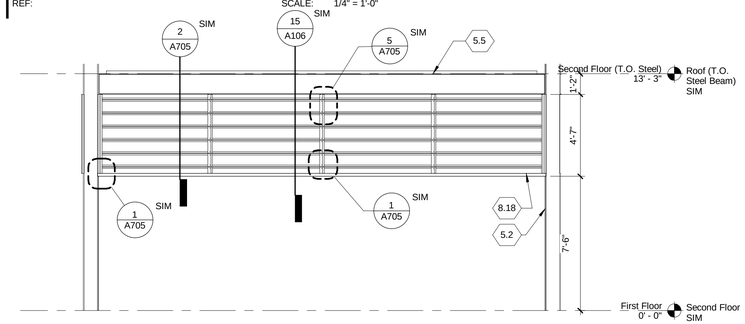
12 TYP AIRFOIL DETAIL

A106 | REF: A106 | SCALE: 1 1/2" = 1'-0"



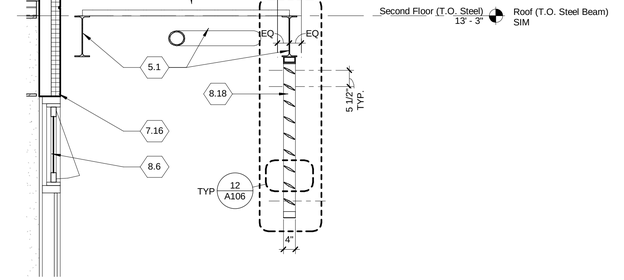
13 SHADE TYPE S4- PLAN

A106 | REF: | SCALE: 1/4" = 1'-0"



14 SHADE TYPE S4- ELEVATION

A106 | REF: A106 | SCALE: 1/4" = 1'-0"



15 SHADE TYPE S4- SECTION

A106 | REF: A106 | SCALE: 1/2" = 1'-0"

NOTE: SEE SHEET A001 FOR MATERIAL KEYNOTES

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

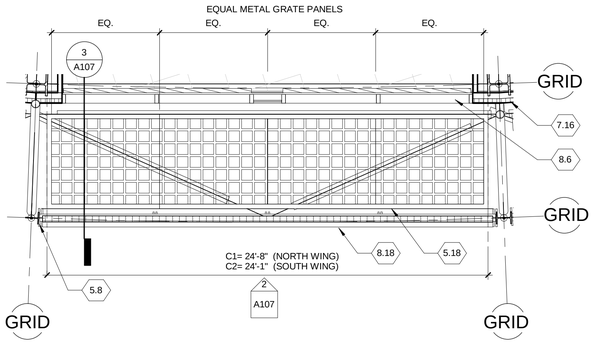
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

VERTICAL SHADE LOUVER TYPES (BID OPTION #2)

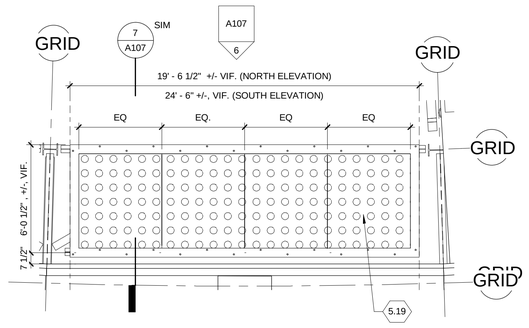
SIZE	CAGE CODE		REV
D	25307	A232-0800- A106	
SCALE	INDEX	SHEET OF	

4/30/2009 1:01:56 PM



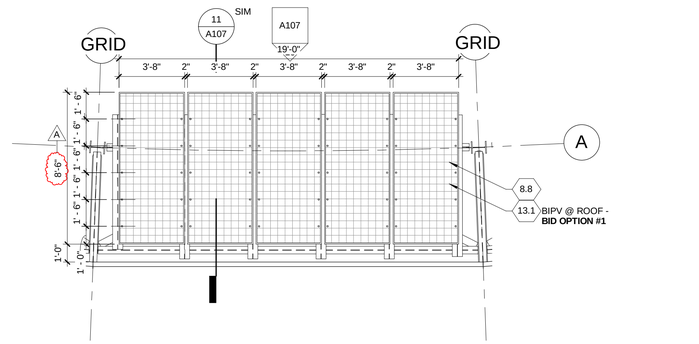
1 SHADE TYPE S5 (METAL GRATING) - PLAN

A107 (METAL GRATE - BID OPTION #3A) SCALE: 1/4" = 1'-0"



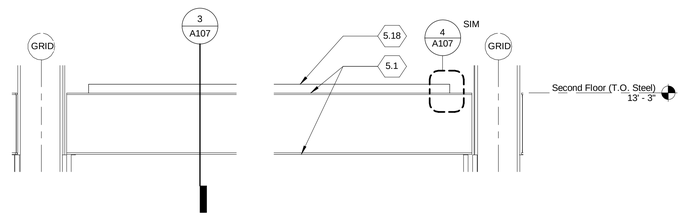
5 SHADE TYPE S6 (PERFORATED METAL PANEL) - PLAN

A107 (PERFORATED METAL PANEL - BID #3B) SCALE: 1/4" = 1'-0"



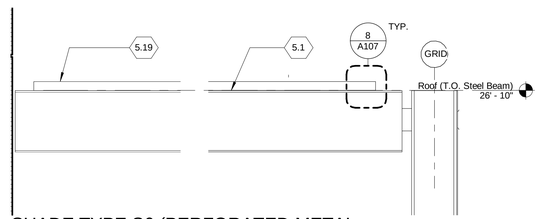
9 SHADE TYPE S7 (GLASS PANEL OVERHANG) - PLAN

A107 (FRITTED GLASS - BASE BID / BIPV - BID OPTION #1) SCALE: 1/4" = 1'-0"



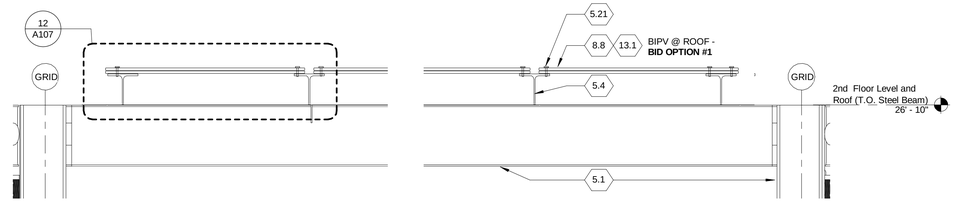
2 SHADE TYPE S5 (METAL GRATING) - ELEVATION

A107 (METAL GRATE - BID OPTION #3A) SCALE: 3/4" = 1'-0"



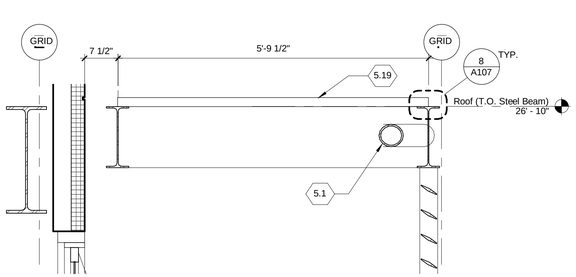
6 SHADE TYPE S6 (PERFORATED METAL PANEL) - ELEVATION

A107 (PERFORATED METAL PANEL - BID OPTION #3B) SCALE: 3/4" = 1'-0"



10 SHADE TYPE S7 (GLASS PANEL OVERHANG) - ELEVATION

A107 (FRITTED GLASS - BASE BID / BIPV - BID OPTION #1) SCALE: 3/4" = 1'-0"

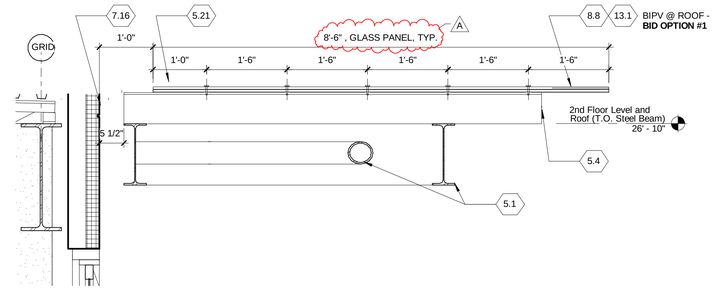


3 SHADE TYPE S5 (METAL GRATING) - SECTION

A107 (METAL GRATE - BID OPTION #3A) SCALE: 3/4" = 1'-0"

7 SHADE TYPE S6 (PERFORATED METAL PANEL) - SECTION

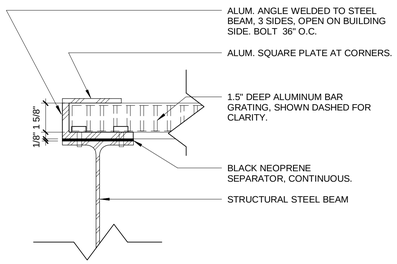
A107 (PERFORATED METAL PANEL - BID OPTION #3B) SCALE: 3/4" = 1'-0"



11 SHADE TYPE S7 (GLASS PANEL OVERHANG) -SECTION

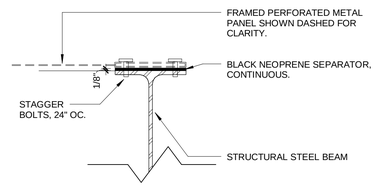
A107 (FRITTED GLASS - BASE BID / BIPV - BID OPTION #1) SCALE: 3/4" = 1'-0"

NOTE: SEE SHEET A001 FOR MATERIAL KEYNOTES



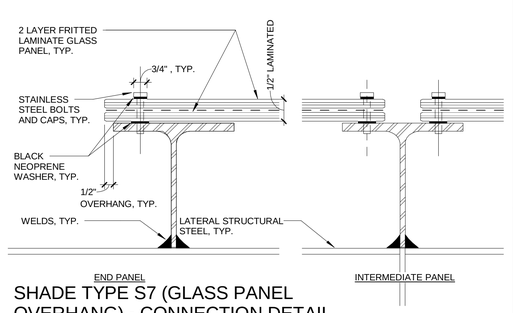
4 METAL GRATE CONNECTION DETAIL @ SECOND FLOOR LEVEL

A107 REF: A107 SCALE: 3" = 1'-0"



8 METAL PANEL CONNECTION AT STRUCTURAL STEEL

A107 REF: A107 SCALE: 3" = 1'-0"



12 SHADE TYPE S7 (GLASS PANEL OVERHANG) - CONNECTION DETAIL, TYP.

A107 (FRITTED GLASS - BASE BID / BIPV - BID OPTION #1) SCALE: NOT TO SCALE.

PROJECT STATUS

BID SET 05/26/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REVISE GLASS PANEL DIMESION FROM 7'-10" TO 8'-6" DEPTH.	JG

		DATE
DRAWN	S MOSHGGOU	
DESIGNED	R PRADHAN	
CHECKED	W JOFFRION	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

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Moffet Field, California

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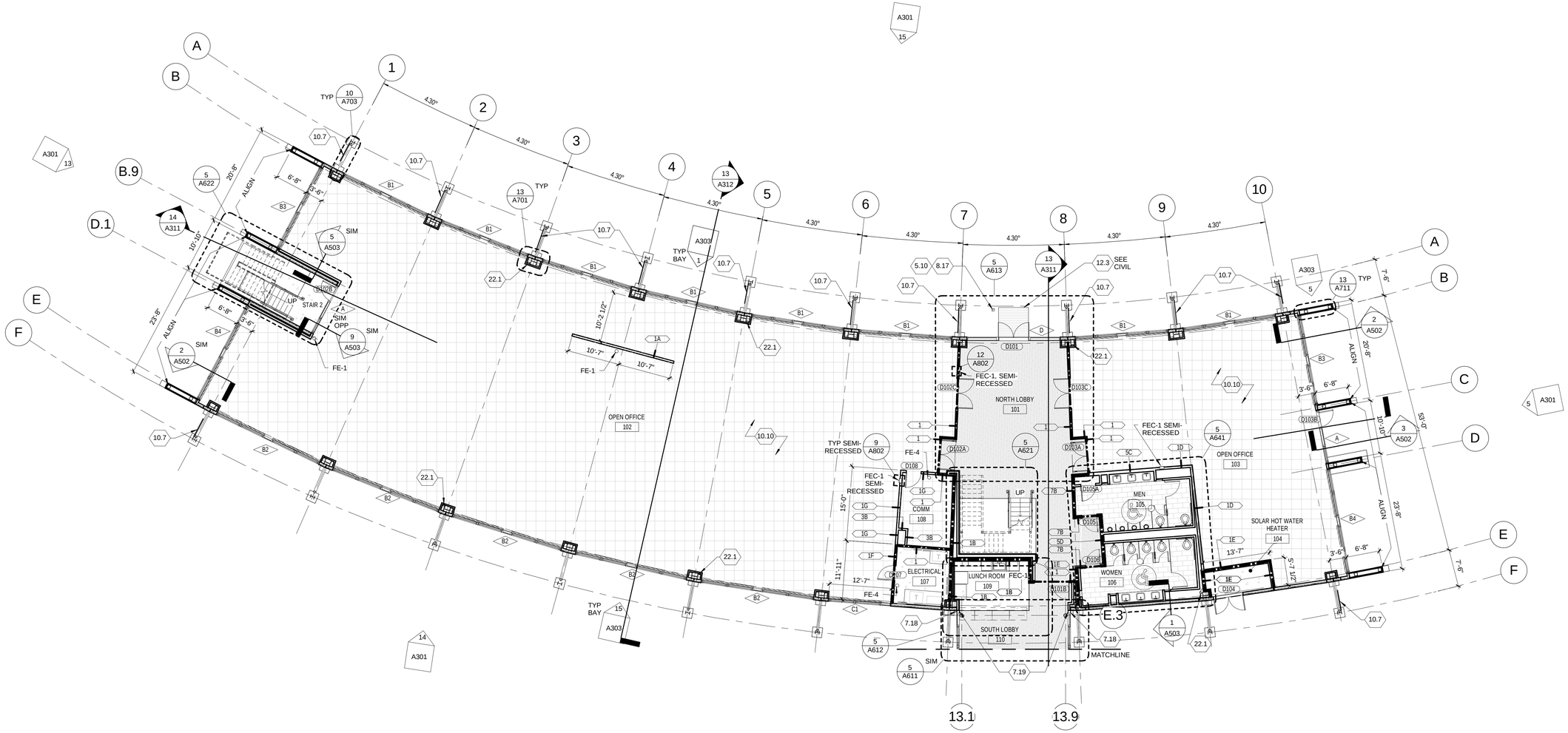
HORIZONTAL SHADE TYPES (BID OPTIONS #1 & #3)

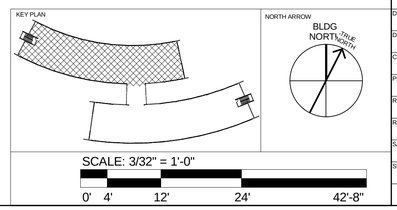
SIZE	CAGE CODE		REV
D	25307	A232-0800- A107	A
SCALE	INDEX	SHEET OF	

5/20/2009 5:18:08 PM

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. ACCESS FLOOR PATTERN LAYOUT BY MFR





KEY PLAN

NORTH ARROW

BLDG NORTH
TRUE NORTH

PROJECT STATUS

BID SET 04/30/09

ISSUE

MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

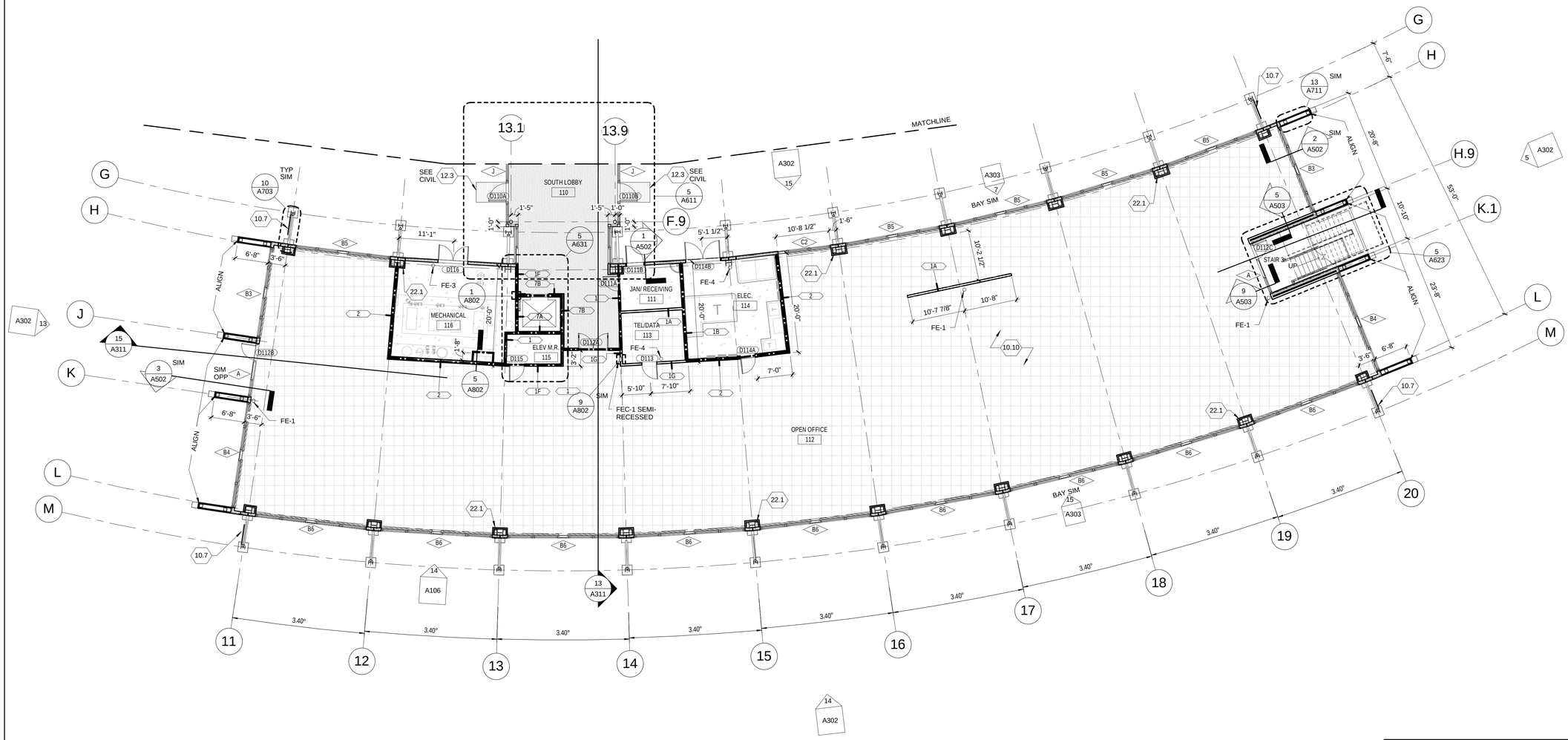
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

FIRST FLOOR PLAN - NORTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A211	
SCALE 1/8"=1'-0"	INDEX	SHEET	OF

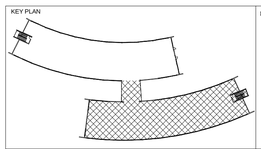
4/30/2009 1:02:37 PM



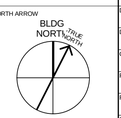
NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. ACCESS FLOOR PATTERN LAYOUT BY MFR

KEY PLAN



NORTH ARROW



SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

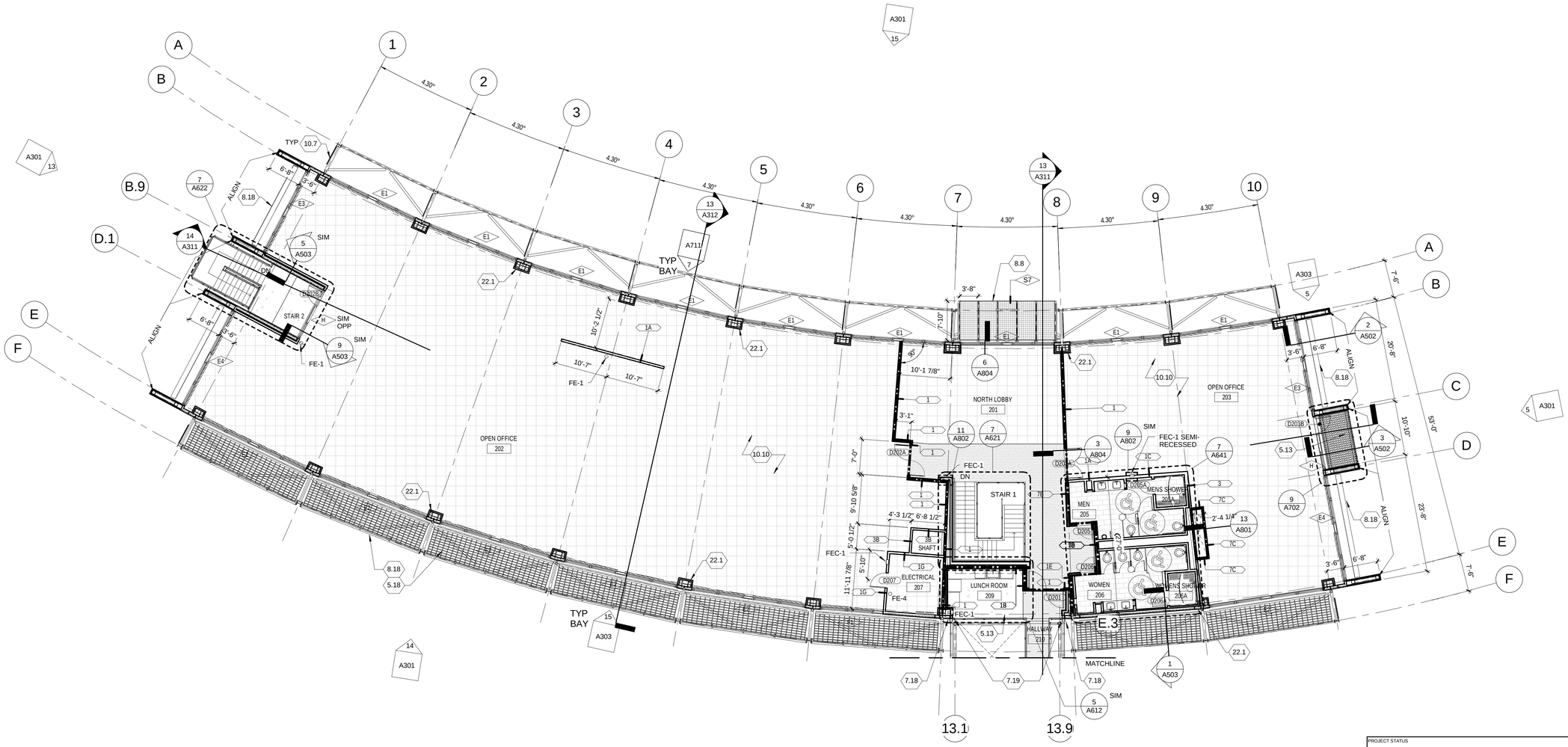
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

FIRST FLOOR PLAN - SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A212	
SCALE	INDEX	SHEET OF	

4/30/2009 1:02:45 PM



NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. ACCESS FLOOR PATTERN LAYOUT BY MFR

KEY PLAN

NORTH ARROW

BLDG NORTH / TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

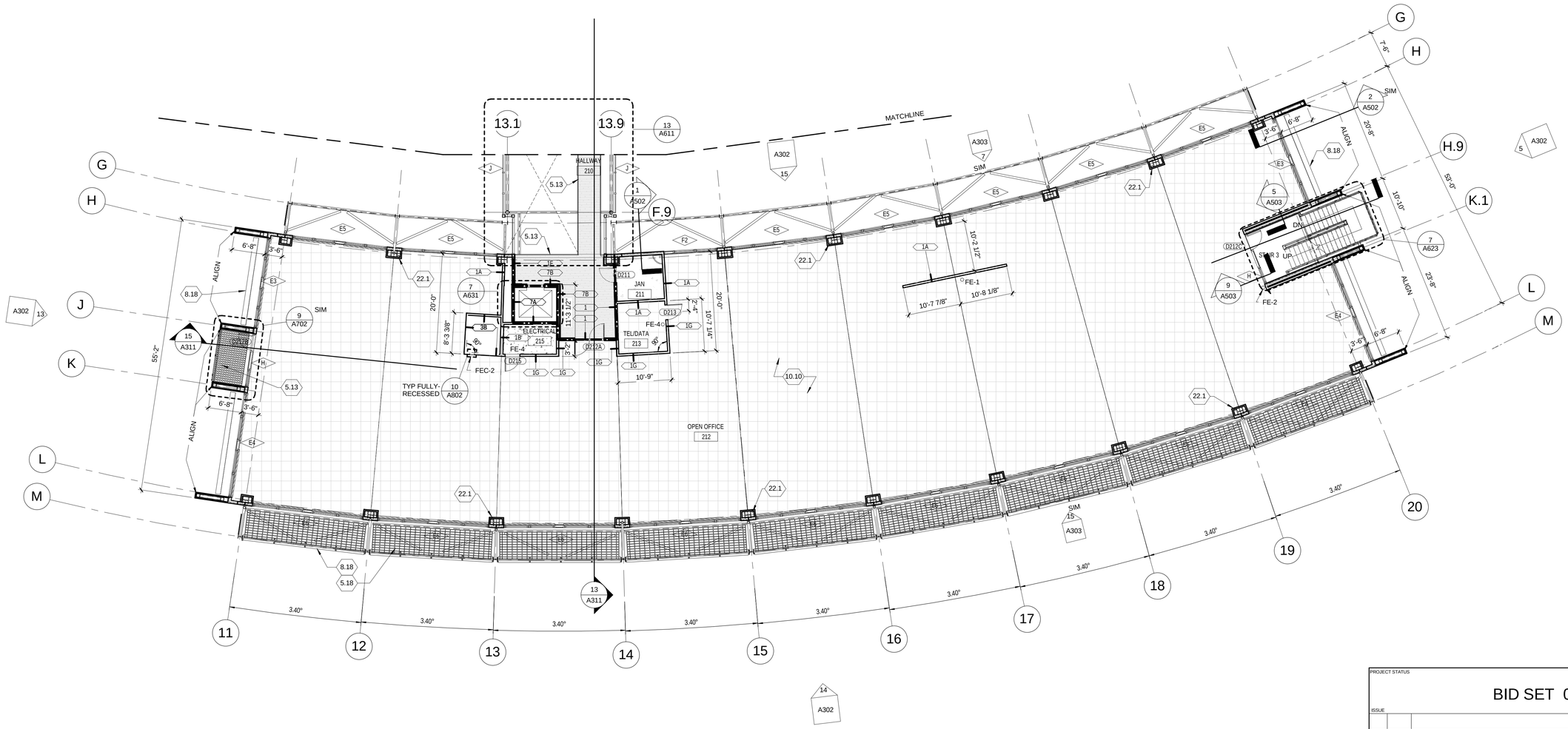
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

SECOND FLOOR PLAN - NORTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A221	
SCALE		INDEX	SHEET OF

4/30/2009 1:02:56 PM



NOTE:

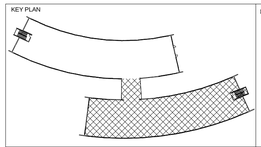
1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. ACCESS FLOOR PATTERN LAYOUT BY MFR

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

KEY PLAN



NORTH ARROW



SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

DRAWN	G JOHNSON DATE
DESIGNED	R PRADHAN DATE
CHECKED	W JOFFRION DATE
PROJMGR	J GRANT DATE
REQUESTOR	R SCHULER DATE
R&QA	DATE
SAFETY	DATE
SUPERVISOR	S FRANKEL DATE

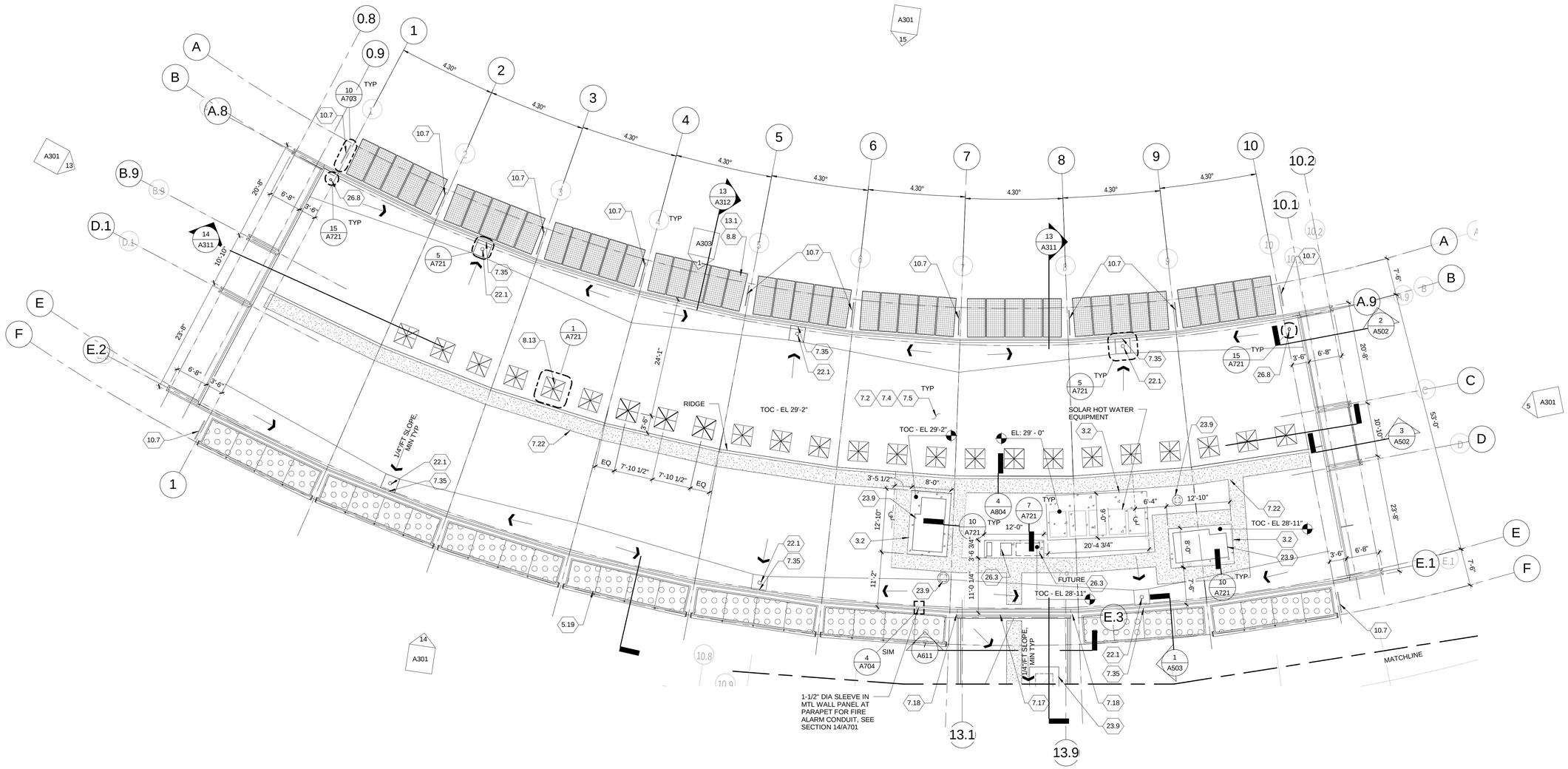
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

SECOND FLOOR PLAN - SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A222	
SCALE	INDEX	SHEET OF	

4/30/2009 1:03:11 PM



NOTE:

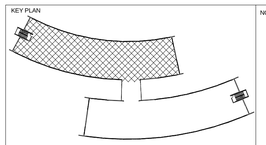
1. SEE SHEET A001 FOR MATERIAL KEYNOTES

2. VERIFY SIZE AND SPACING OF CONC EQUIPMENT CURBS WITH EQUIPMENT REQUIREMENTS THAT ARE ACTUALLY PROVIDED.

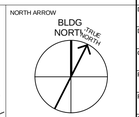
3. CONC HOUSEKEEPING PAD SIZE AND LOCATIONS MUST BE VERIFIED AND COORDINATED WITH MECHANICAL AND ELECTRICAL REQUIREMENTS FOR EQUIPMENT ACTUALLY RPOVIDED.

4. CONTRACTOR SHALL DETERMINE LAYOUT OF TAPERED INSULATION IN ROOF AREA NORTH OF GRID LINE H PRIOR TO INSTALLATION - GOVT APPROVAL REQUIRED.

KEY PLAN



NORTH ARROW



SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE

MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

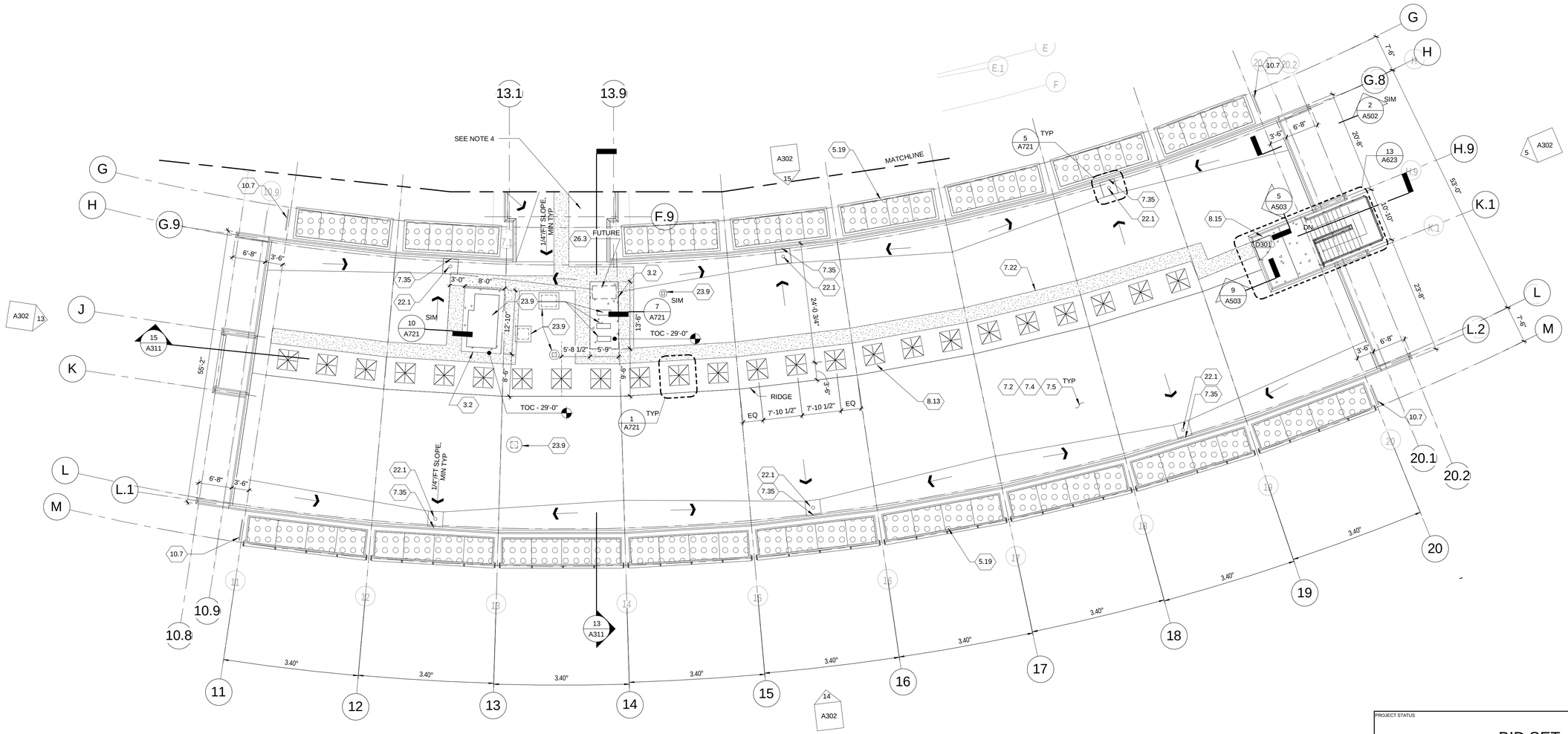
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

ROOF PLAN - NORTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A231	
SCALE	INDEX	SHEET	OF

4/30/2009 1:03:16 PM



NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES

2. VERIFY SIZE AND SPACING OF CONC EQUIPMENT CURBS WITH EQUIPMENT REQUIREMENTS THAT ARE ACTUALLY PROVIDED.

3. CONC HOUSEKEEPING PAD SIZE AND LOCATIONS MUST BE VERIFIED AND COORDINATED WITH MECHANICAL AND ELECTRICAL REQUIREMENTS FOR EQUIPMENT ACTUALLY RPOVIDED.

4. CONTRACTOR SHALL DETERMINE LAYOUT OF TAPERED INSULATION IN ROOF AREA NORTH OF GRID LINE H PRIOR TO INSTALLATION - GOVT APPROVAL REQUIRED.

PROJECT STATUS

BID SET 04/30/09

MARK	DATE	DESCRIPTION	INITIAL

KEY PLAN

NORTH ARROW

BLDG NORTH

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

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N232 COLLABORATIVE SUPPORT FACILITY

ROOF PLAN - SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A232	
SCALE	INDEX	SHEET OF	

4/30/2009 1:03:22 PM



CEILING PLAN LEGEND

- RADIANT CEILING PANELS
- GWB CEILING
- DOWNLIGHT
- WIDE PENDANT
- THIN PENDANT
- UTILITY PENDANT
- WALL SCONCE
- EXIT SIGN
- STRUCTURAL BEAM ABOVE

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. SEE ELECTRICAL FOR LIGHTING
3. PAINT ALL CEILING PIPES, DUCTS, RACEWAYS P-2 TYP.

KEY PLAN

NORTH ARROW

BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

MARK	DATE	DESCRIPTION	INITIAL
		ISSUE	

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

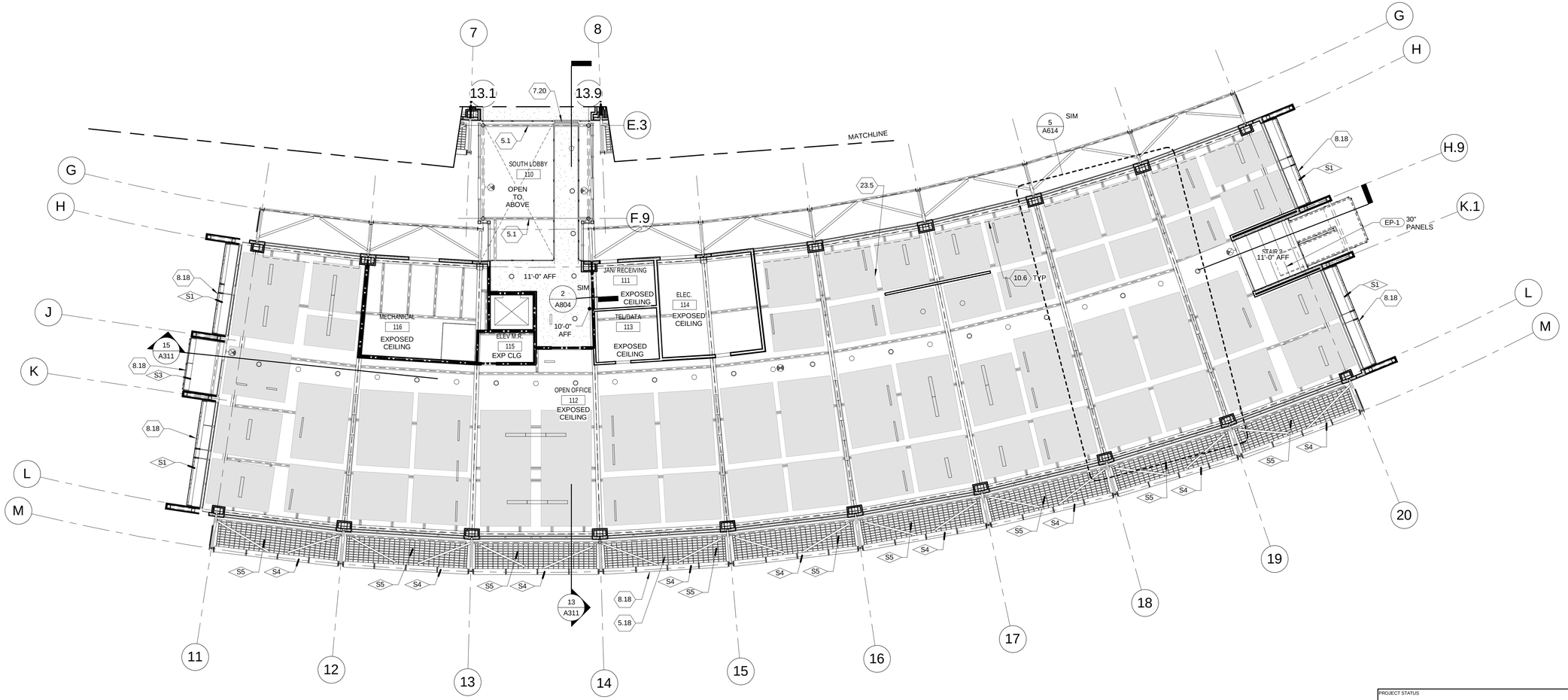
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

FIRST FLOOR REFLECTED CEILING PLAN - NORTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A241	
SCALE	INDEX	SHEET OF	

4/30/2009 1:03:31 PM



CEILING PLAN LEGEND

- RADIANT CEILING PANELS
- GWB CEILING
- DOWNLIGHT
- WIDE PENDANT
- THIN PENDANT
- UTILITY PENDANT
- WALL SCONCE
- EXIT SIGN
- STRUCTURAL BEAM ABOVE

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. SEE ELECTRICAL FOR LIGHTING
3. PAINT ALL CEILING PIPES, DUCTS, RACEWAYS P-2 TYP.

KEY PLAN

NORTH ARROW

BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

FIRST FLOOR REFLECTED CEILING PLAN - SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A242	
SCALE		INDEX	SHEET OF

4/30/2009 1:03:41 PM



CEILING PLAN LEGEND

- RADIANT CEILING PANELS
- GWB CEILING
- DOWNLIGHT
- WIDE PENDANT
- THIN PENDANT
- UTILITY PENDANT
- WALL SCONCE
- EXIT SIGN
- STRUCTURAL BEAM ABOVE

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. SEE ELECTRICAL FOR LIGHTING
3. PAINT ALL CEILING PIPES, DUCTS, RACEWAYS P-2 TYP.

A | SECOND FLOOR RCP- NORTH WING
A251 | REF: A205 | NOT TO SCALE

KEY PLAN

NORTH ARROW: BLDG NORTH, GRID NORTH

SCALE: 3/32" = 1'-0"
0' 4' 12' 24' 42'-8"

PROJECT STATUS: PROPOSAL SET 07/23/09

ISSUE	MARK	DATE	DESCRIPTION	INITIAL
	A	07/01/09	CORRECTED CALLOUT FOR FRITTED GLAZING 8.8	

		DATE
DRAWN	G JOHNSON	
DESIGNED	R PRADHAN	
CHECKED	W JOFFRION	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

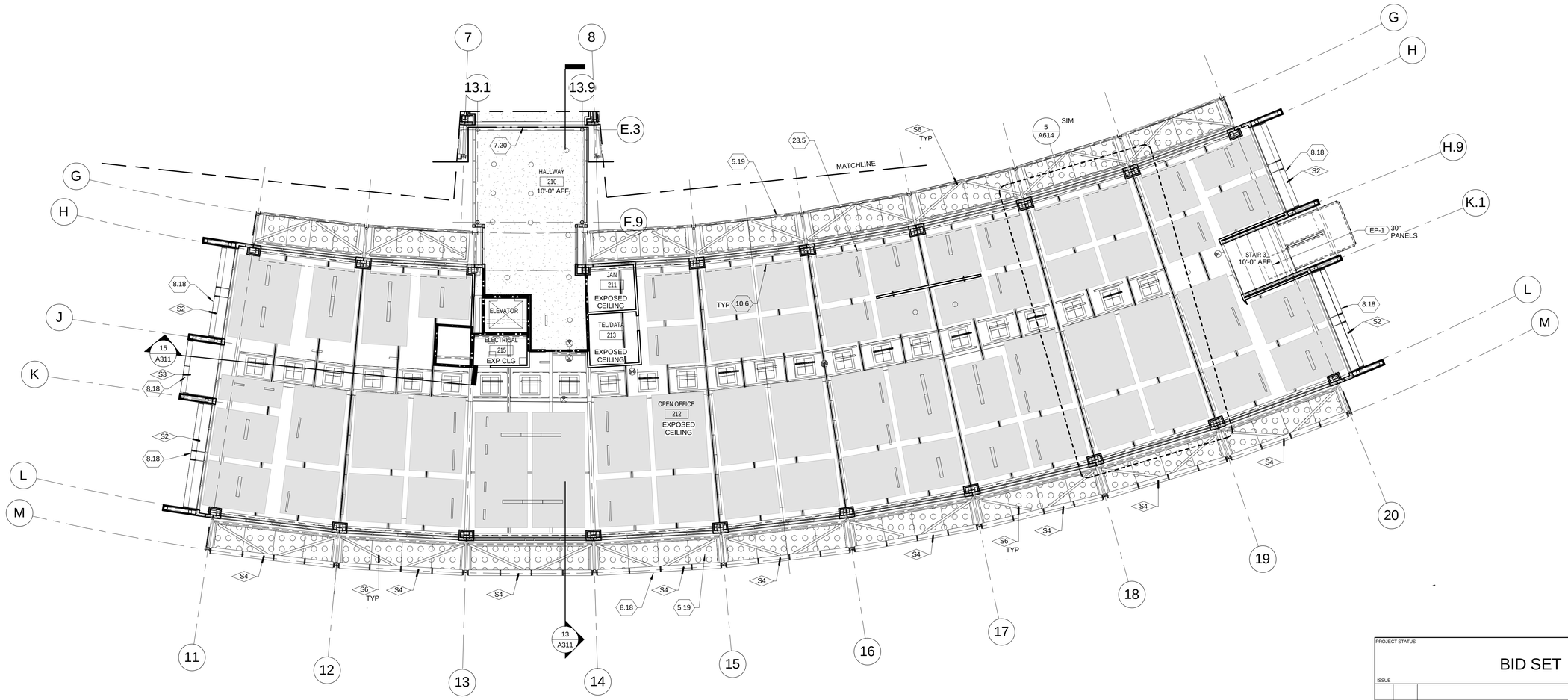
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

SECOND FLOOR REFLECTED CEILING PLAN - NORTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- A251	A
SCALE	INDEX	SHEET	OF

8/24/2009 3:53:34 PM



CEILING PLAN LEGEND

- RADIANT CEILING PANELS
- GWB CEILING
- DOWNLIGHT
- WIDE PENDANT
- THIN PENDANT
- UTILITY PENDANT
- WALL SCONCE
- EXIT SIGN
- STRUCTURAL BEAM ABOVE

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES
2. SEE ELECTRICAL FOR LIGHTING
3. PAINT ALL CEILING PIPES, DUCTS, RACEWAYS, P-2 TYP.

KEY PLAN

NORTH ARROW

BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
RAQA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

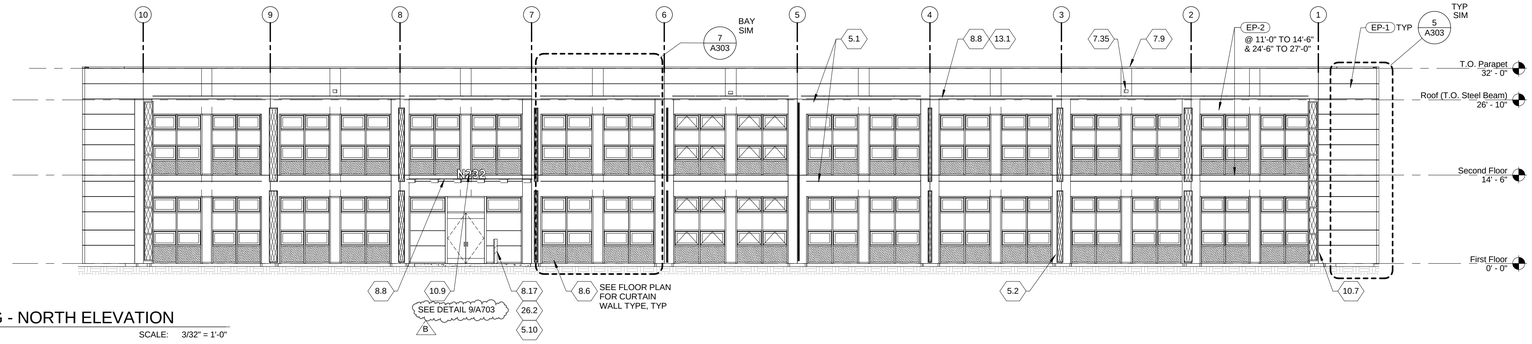
SECOND FLOOR REFLECTED CEILING PLAN - SOUTH WING

SIZE	CAGE CODE		REV
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SCALE	INDEX	SHEET	OF

4/30/2009 1:04:00 PM

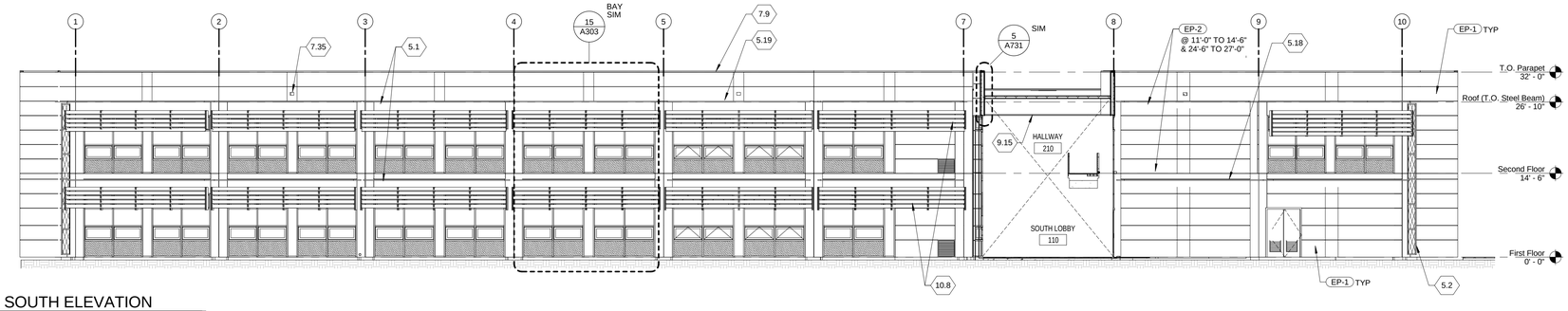
NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES



15 | NORTH WING - NORTH ELEVATION

A301 | REF: A202 | SCALE: 3/32" = 1'-0"

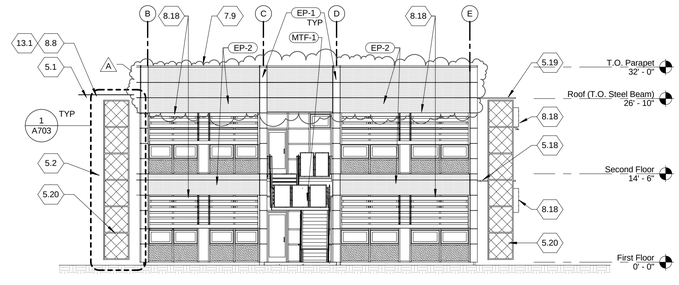


14 | NORTH WING - SOUTH ELEVATION

A301 | REF: A202 | SCALE: 3/32" = 1'-0"

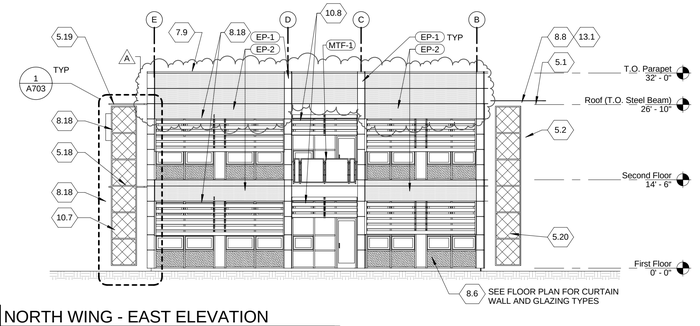
SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"



13 | NORTH WING- WEST ELEVATION

A301 | REF: A202 | SCALE: 3/32" = 1'-0"



5 | NORTH WING - EAST ELEVATION

A301 | REF: A202 | SCALE: 3/32" = 1'-0"

PROJECT STATUS

PROPOSAL SET 07/23/09

ISSUE			
B	07-01-09	CORRECTED DETAIL CALLOUT IN DETAIL 15	FB
MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REVISE EXTERIOR METAL WALL PANEL TO BE EP-2 AT BUILDING ENVELOPE.	JG

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

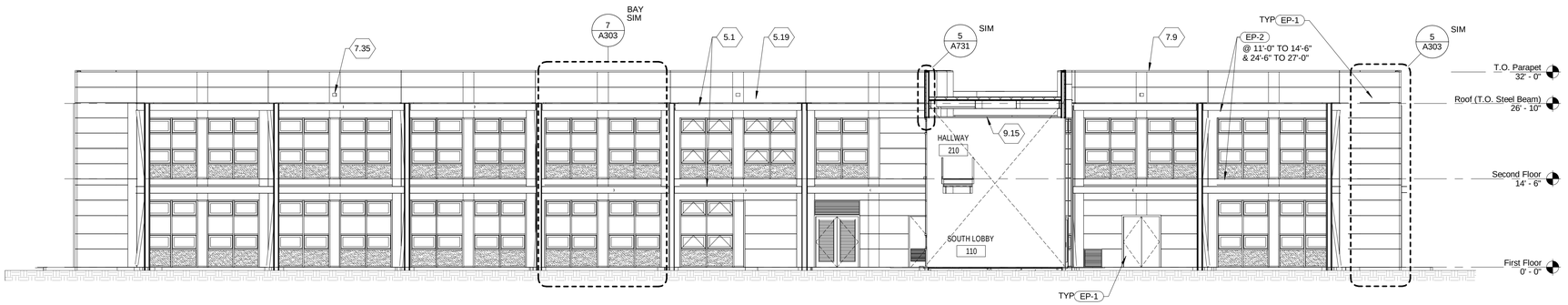
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

EXTERIOR ELEVATIONS - NORTH WING

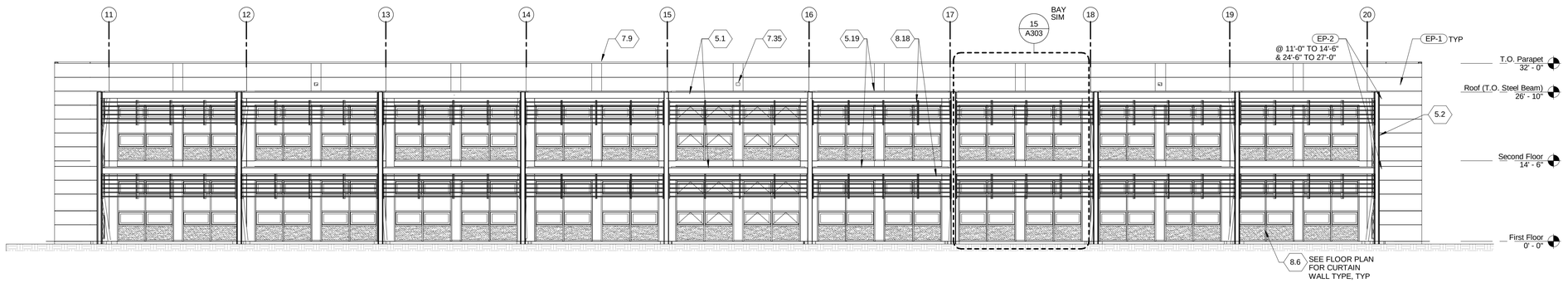
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SCALE	INDEX	SHEET	OF

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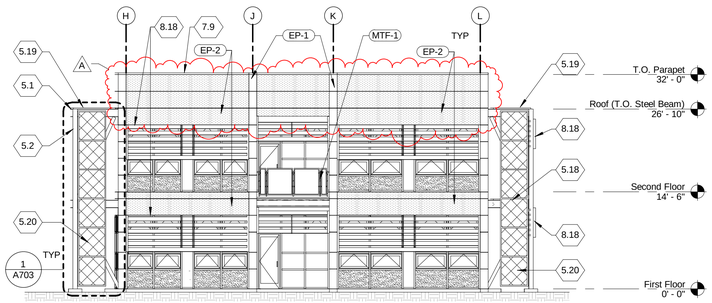
15 A302 | SOUTH WING - NORTH ELEVATION

REF: A202 SCALE: 3/32" = 1'-0"



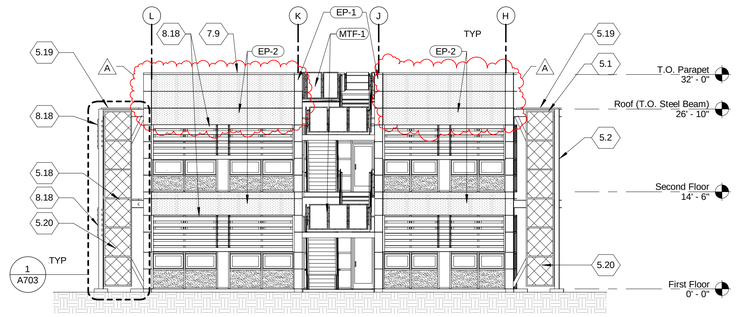
14 A302 | SOUTH WING- SOUTH ELEVATION

REF: A202 SCALE: 3/32" = 1'-0"



13 A302 | SOUTH WING - WEST ELEVATION

REF: A202 SCALE: 3/32" = 1'-0"



5 A302 | SOUTH WING - EAST ELEVATION

REF: A202 SCALE: 3/32" = 1'-0"

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 05/26/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REVISE EXTERIOR METAL WALL PANEL TO BE EP-2 AT BUILDING ENVELOPE.	JG

		DATE
DRAWN	G JOHNSON	
DESIGNED	R PRADHAN	
CHECKED	W JOFFRION	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
RAQA		
SAFETY		
SUPERVISOR	S FRANKEL	

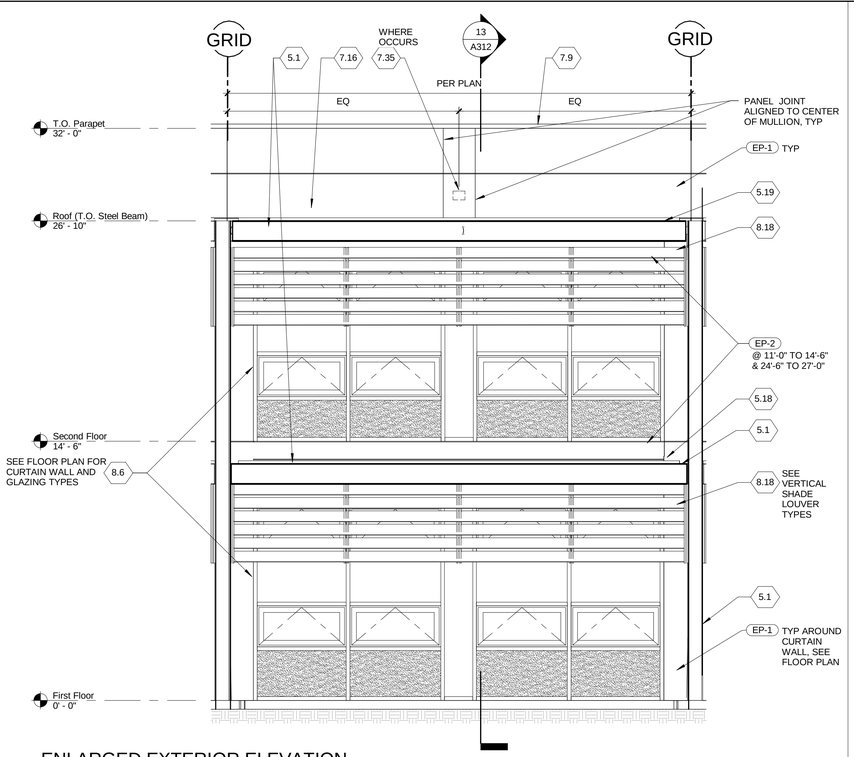
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

EXTERIOR ELEVATIONS - SOUTH WING

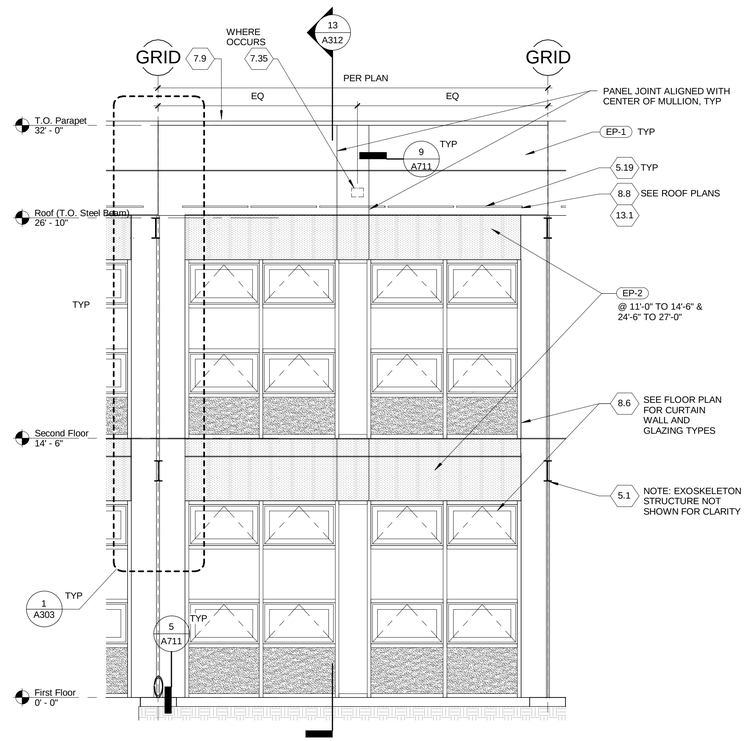
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SCALE	INDEX	SHEET OF	

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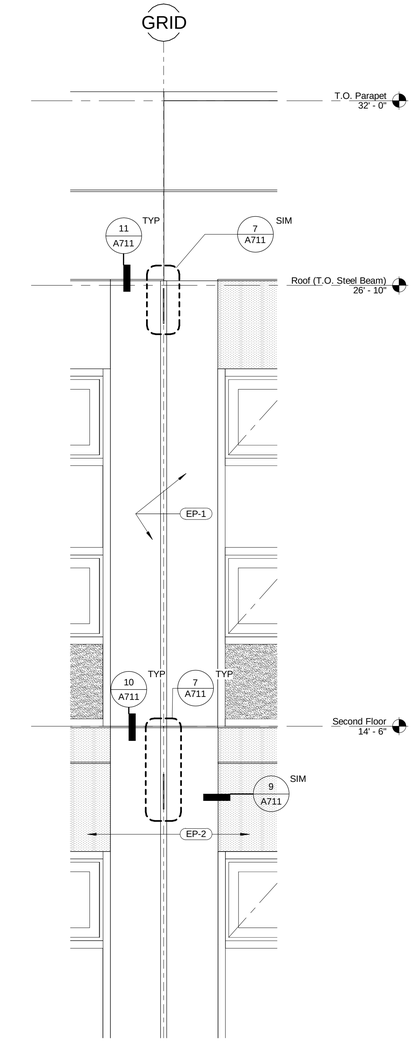
15 ENLARGED EXTERIOR ELEVATION- SOUTH TYPICAL BAY

A303 | REF: A211 | SCALE: 1/4" = 1'-0"



7 ENLARGED EXTERIOR ELEVATION- NORTH TYPICAL BAY

A303 | REF: A211 | SCALE: 1/4" = 1'-0"



1 TYP PANEL PENETRATION OF STEEL BEAMS @ 2ND FLOOR & ROOF LEVEL

A303 | REF: A303 | SCALE: 1/2" = 1'-0"

NOTES:

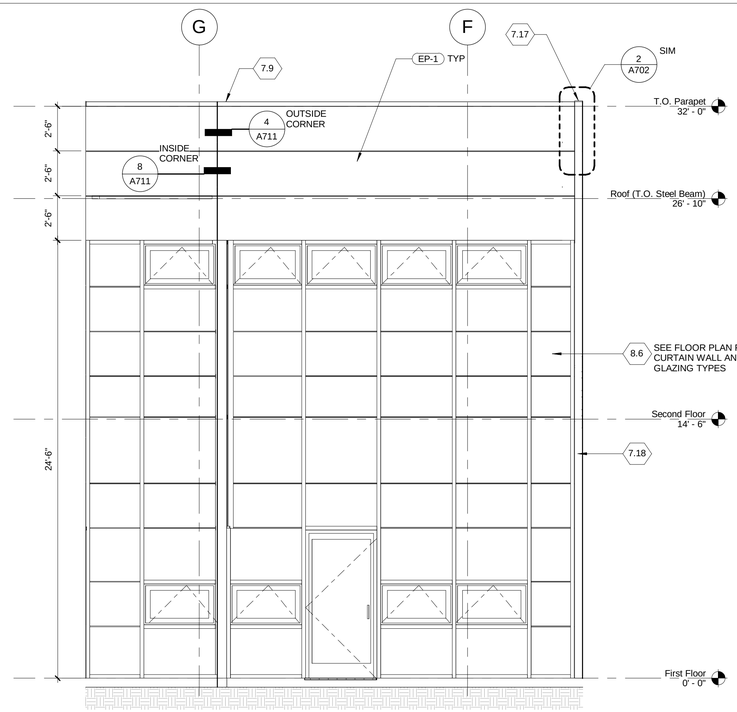
1. SEE SHEET A104 FOR EXTERIOR FINISH/COLOR LEGEND
2. SEE DOOR AND CURTAIN WALL SCHEDULE FOR MATERIALS AND COLORS
3. SEE SHEET A001 FOR MATERIAL KEYNOTES
4. SEE FLOOR PLANS FOR CURTAIN WALL TYPES AND GLAZING TYPES

SCALE: 1/2" = 1'-0"

0' 1' 2' 4' 8'

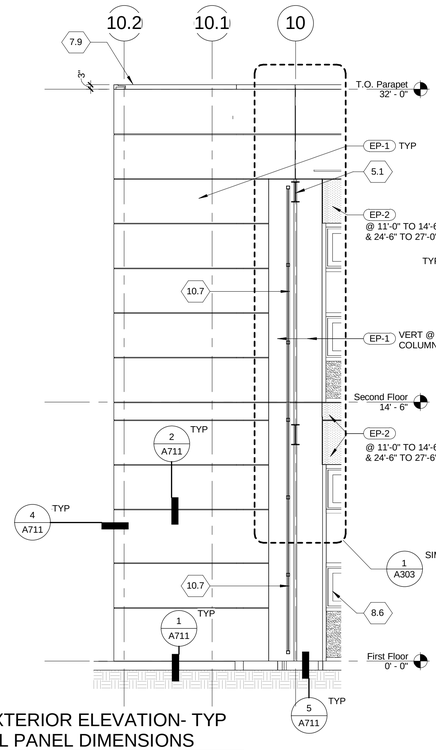
SCALE: 1/4" = 1'-0"

0' 2' 4' 8' 16'



13 CONNECTOR- EAST EXTERIOR ELEVATION (WEST EXT. ELEV. SIM., OPP. HAND)

A303 | REF: A611 | SCALE: 1/4" = 1'-0"



5 ENLARGED EXTERIOR ELEVATION- TYP EXTERIOR MTL PANEL DIMENSIONS

A303 | REF: A211 | SCALE: 1/4" = 1'-0"

PROJECT STATUS

BID SET 04/30/09

ISSUE

MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

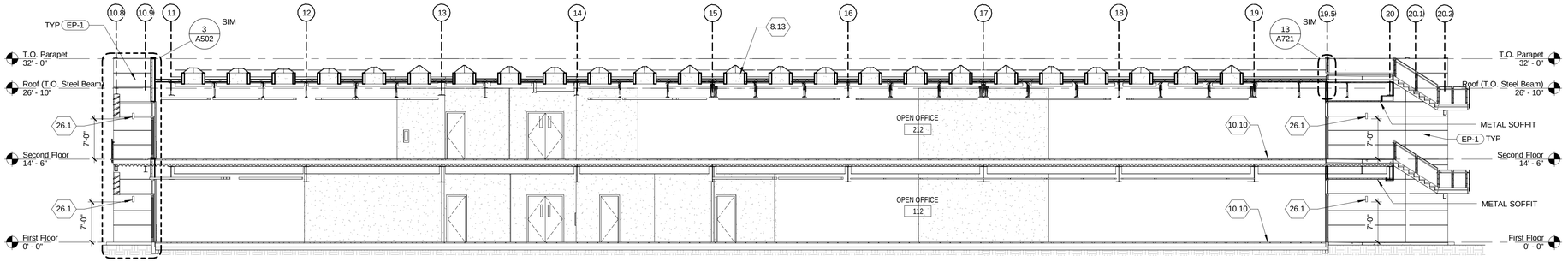
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Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

ENLARGED EXTERIOR ELEVATIONS

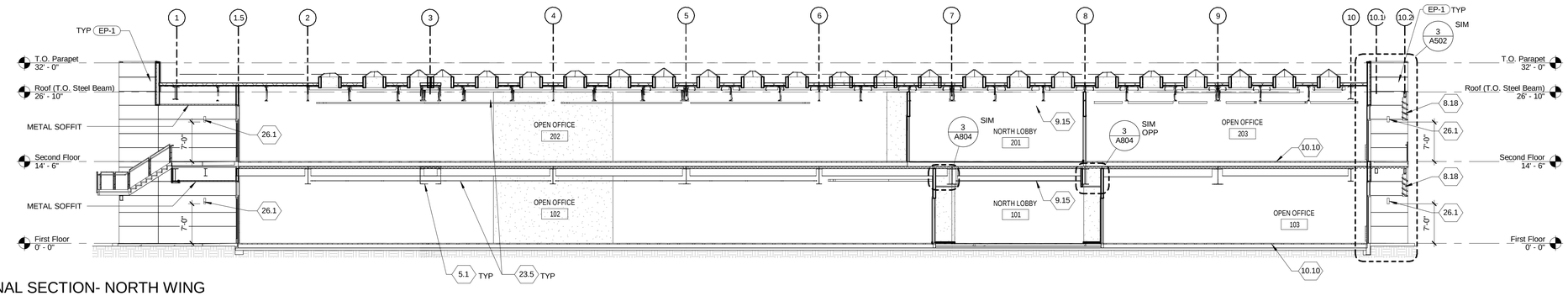
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SCALE	INDEX	SHEET OF	

4/30/2009 1:08:17 PM



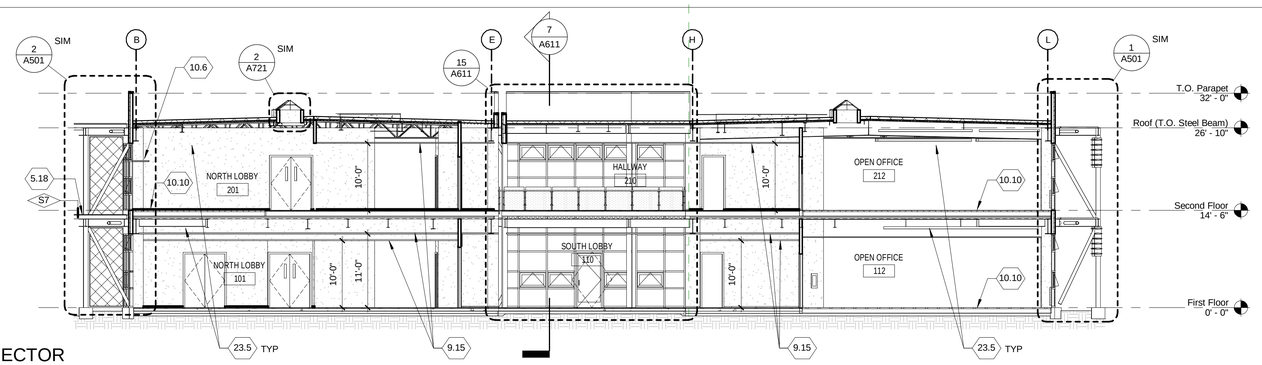
15 LONGITUDINAL SECTION- SOUTH WING (FLATTENED VIEW)

A311 REF: A212 SCALE: 3/32" = 1'-0"



14 LONGITUDINAL SECTION- NORTH WING (FLATTENED VIEW)

A311 REF: A211 SCALE: 3/32" = 1'-0"



13 TRANSVERSE SECTION @ CONNECTOR - EAST

A311 REF: A202 SCALE: 3/32" = 1'-0"

NOTE:

1. SEE SHEET A001 FOR MATERIAL KEYNOTES

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
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N232 COLLABORATIVE SUPPORT FACILITY

BUILDING SECTIONS

SIZE	CAGE CODE		REV
D	25307	A232-0800- A311	
SCALE	INDEX	SHEET OF	

4/30/2009 1:08:54 PM

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
3.1 CAST IN PLACE CONCRETE
3.2 6" CONC HOUSEKEEPING PAD
3.3 VAPOR BARRIER
3.4 GRANULAR FILL
3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
5.1 STEEL BEAM
5.2 STEEL COLUMN
5.3 METAL DECK
5.4 STEEL ANGLE
5.5 STEEL PLATE
5.6 TUBULAR STEEL
5.7 STEEL BENT PLATE
5.8 STAINLESS STEEL FRAME
5.9 OPEN WEB STEEL JOIST
5.10 S.S. BOLLARD (6" SQ)
5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
5.12 CANE DETECTION RAIL
5.13 GUARDRAIL
5.14 STAINLESS STEEL HANDRAIL
5.15 METAL FRAMED STAIR
5.16 STEEL CHANNEL
5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
5.20 DECORATIVE METAL MESH VINESCREEN
5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
6.3 5/8" GLASS MAT FACED GYP SHEATHING
6.4 PLASTIC LAMINATE
6.5 SOLID-SURFACING MATERIAL COUNTERTOP
6.6 (NOT USED)
6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
7.2 PVC ROOFING
7.3 MEMBRANE EDGE FASTENER @ 12" O/C
7.4 1/4" PROTECTION BOARD
7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
7.6 BATT INSULATION R=19
7.7 PVC MEMBRANE FLASHING
7.8 EXTRUDED ALUM TRIM
7.9 ALUM FLASHING
7.10 FORMED SHEET SS COPING
7.11 BELOW GRADE DAMP/WATERPROOFING
7.12 SEALANT WITH BACKER ROD
7.13 20 GA GALVANIZED SPLASH PAN
7.14 DOWN SPOUT
7.15 WATERPROOFING MEMBRANE
7.16 INSULATED METAL PANEL CLADDING
7.17 PVC ROOF SEISMIC JOINT COVER
7.18 EXTERIOR WALL SEISMIC JOINT COVER
7.19 INTERIOR WALL SEISMIC JOINT COVER
7.20 CEILING SEISMIC JOINT COVER
7.21 FIRESTOPPING
7.22 SAND COATED ROOF WALKWAY
7.23 METAL SPANDREL PANEL (INSULATED)
7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
7.27 FLOOR SEISMIC JOINT COVER
7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
7.29 METAL PANEL SOFFIT
7.30 1" RIGID INSULATION BOARD
7.31 WATERPROOF TRAFFIC COATING
7.32 COMPRESSION SEAL
7.33 SILICONE SEALANT
7.34 NEOPRENE SPACER (BLACK).
7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
7.36 1/2" FOIL-BACKED RIGID INSULATION
7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
8.1 DOOR & FRAME
8.2 MOTORIZED OPERABLE WINDOW
8.3 MANUAL OPERABLE WINDOW
8.4 AUTOMATIC DOOR BOTTOM
8.5 THRESHOLD
8.6 GLAZED ALUM CURTAIN WALL SYSTEM
8.7 1" INSULATED GLAZING
8.8 FRITTED GLAZING
8.9 SPANDREL GLAZING
8.10 VISION GLASS (SAFETY WHERE REQUIRED)
8.11 (NOT USED)
8.12 AUTOMATIC ENTRANCE DOOR
8.13 SKYLIGHT
8.14 WEATHERSTRIPPING
8.15 MTL SECURITY GATE
8.16 DOOR PULL
8.17 AUTOMATIC DOOR OPERATOR
8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
9.1 1/2" GWB TYPE X
9.2 5/8" GWB TYPE X
9.3 1" GWB SHAFT LINER
9.4 20 GA MTL STUD @ 16" O/C
9.5 SLOTTED SLIP TRACK
9.6 METAL STUD TRACK
9.7 COLD FORMED FURRING CHANNEL
9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
9.9 FRAMING ANGLE, MIN 20 GA GALV.
9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
9.11 SHAFT J RUNNER
9.12 CERAMIC TILE
9.13 REINFORCED MORTAR SETTING BED
9.14 SCHEDULED FLOORING
9.15 SUSPENDED GYP BOARD CEILING SYSTEM
9.16 SCHEDULED WALL BASE
9.17 PAINT
9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
9.20 3/4" RECLAIMED WOOD FLOORING
9.21 SOUND ATTENUATION BLANKET
9.22 ACOUSTICAL INSULATION 3" (UON)
9.23 SUSPENDED ACOUSTICAL CEILING
9.24 STONE TILE
9.25 RECLAIMED WOOD WALL PANEL
9.26 METAL COATINGS AND SEALER
9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
10.1 TOILET PARTITION
10.2 (NOT USED)
10.3 METAL LOCKER
10.4 FIRE EXTINGUISHER CABINET
10.5 DOOR STOP
10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
10.7 VINE SCREEN SYSTEM
10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
11.1 MOTORIZED PROJECTION SCREEN
11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
12.1 MOTORIZED WINDOW SHADE
12.2 SYSTEM FURNITURE, NIC
12.3 ENTRANCE FLOOR MAT & FRAME
12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
21.1 FIRE SPRINKLER HEAD
21.2 FIRE SPRINKLER PIPING

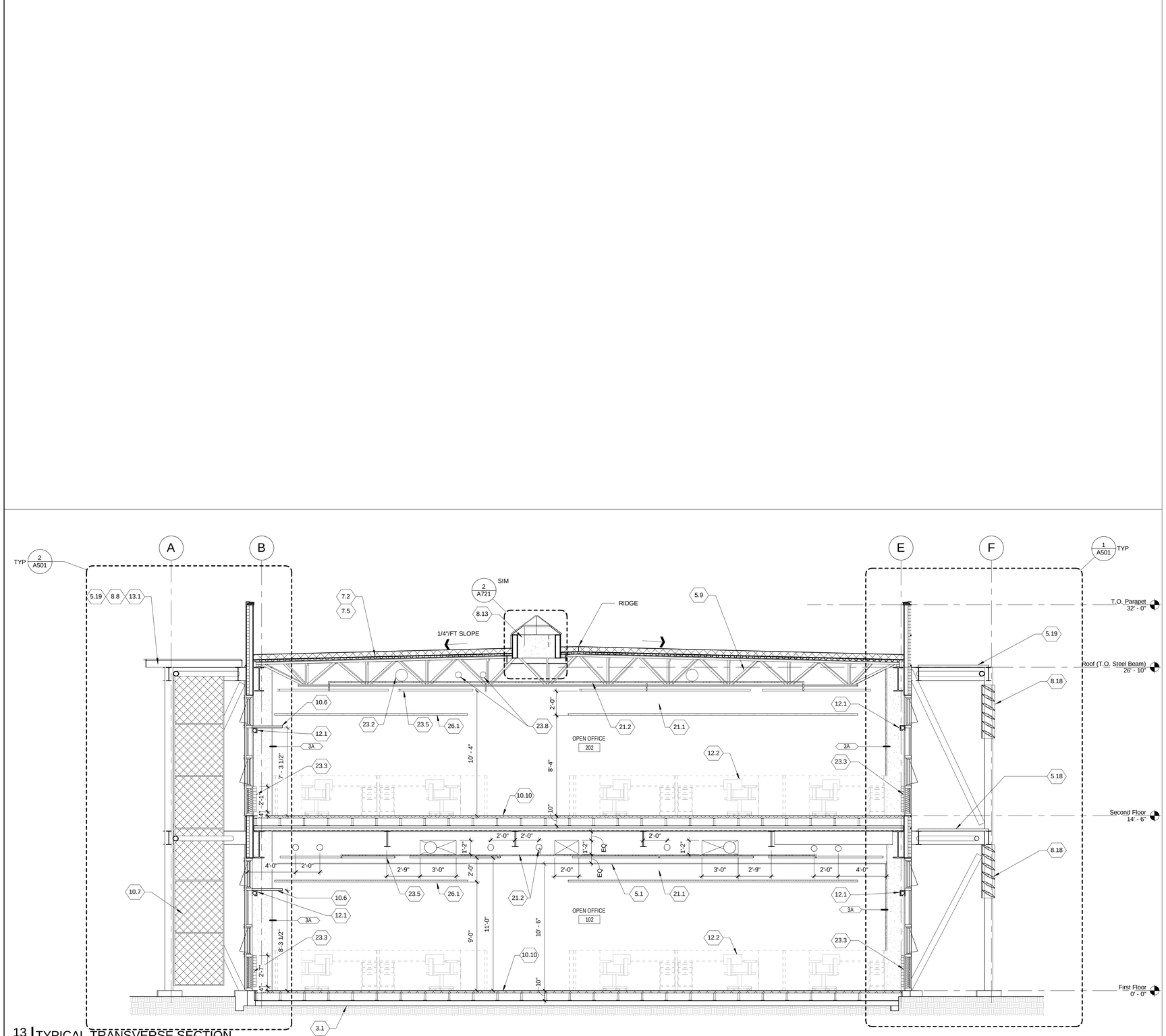
DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
22.1 ROOF DRAIN
22.2 NOT USED
22.3 VENT THROUGH ROOF
22.4 ELECTRIC WATER COOLER
22.5 KITCHEN SINK
22.6 SERVICE SINK
22.7 FLOOR DRAIN
22.8 FILTERED WATER SYSTEM FAUCET
22.9 DUAL FLUSH TOILET
22.10 HIGH EFFICIENCY TOILET
22.11 LOW CONSUMPTION URINAL
22.12 COUNTERTOP SINK
22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
22.14 HAND SHOWER SET WITH SLIDE BAR
22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
23.1 BOILER FLUE
23.2 DUCT
23.3 PERIMETER HYDRONIC HEATER
23.4 FIRE DAMPER
23.5 RADIANT CEILING PANEL
23.6 MECHANICAL SHAFT OPENING
23.7 RADIANT FLOOR SLAB SYSTEM
23.8 MECHANICAL PIPING
23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
26.1 LIGHT FIXTURE
26.2 CARD READER
26.3 PHOTOVOLTAIC INVERTER
26.4 POWER - DUPLEX
26.5 POWER - QUAD
26.6 POWER/DATA OUTLET COMBINATION
26.7 SWITCH
26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
28.1 FIRE ALARM MANUAL PULL STATION

DIVISION [illegible]
32.1 CONCRETE PAVING



SCALE: 1/4" = 1'-0"

0' 2' 4' 8' 16'

13 TYPICAL TRANSVERSE SECTION
A312 | REF: A202 SCALE: 1/4" = 1'-0"

NOTE:
SEE SHEET S311 FOR OPENINGS IN GIRDER, TYP

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

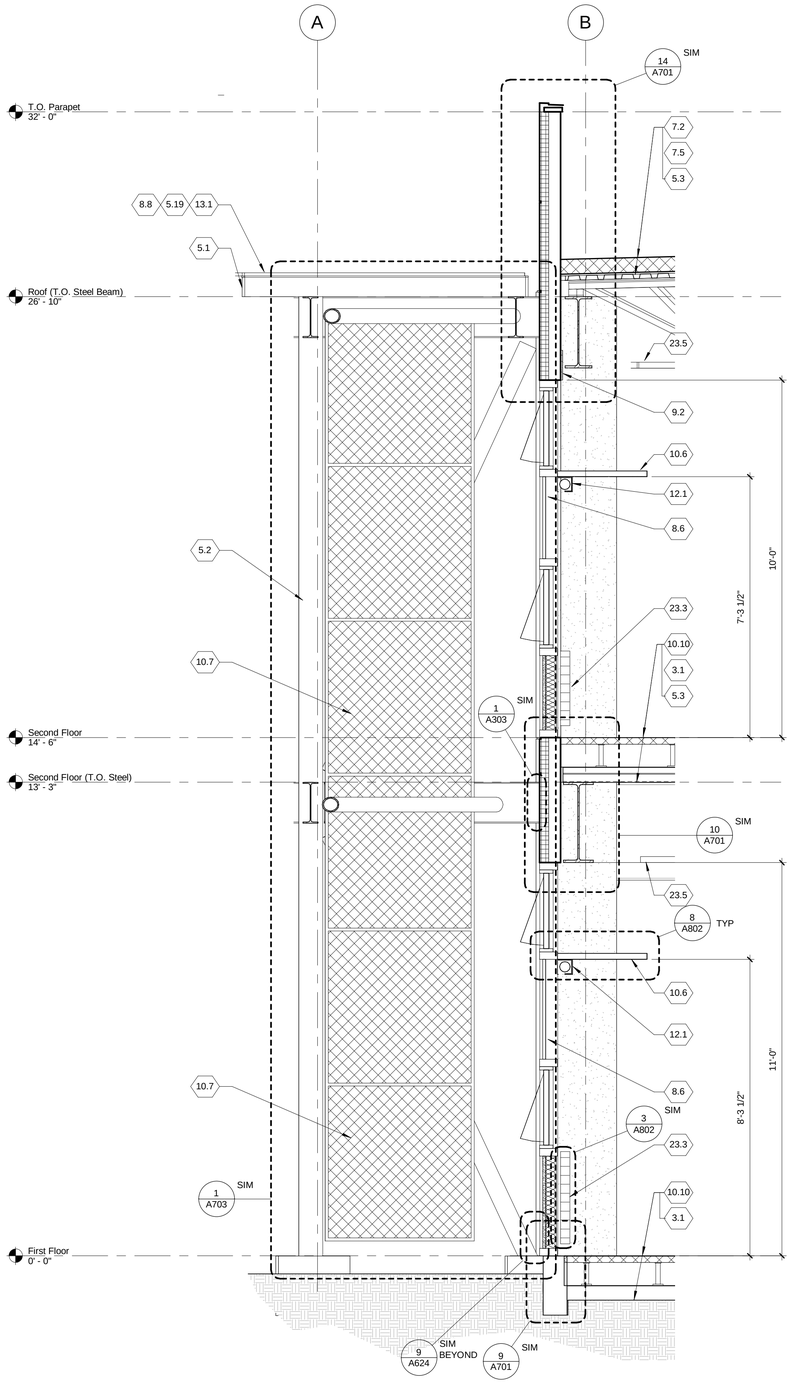
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

BUILDING SECTIONS

SIZE	CAGE CODE		REV
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SCALE		INDEX SHEET OF	

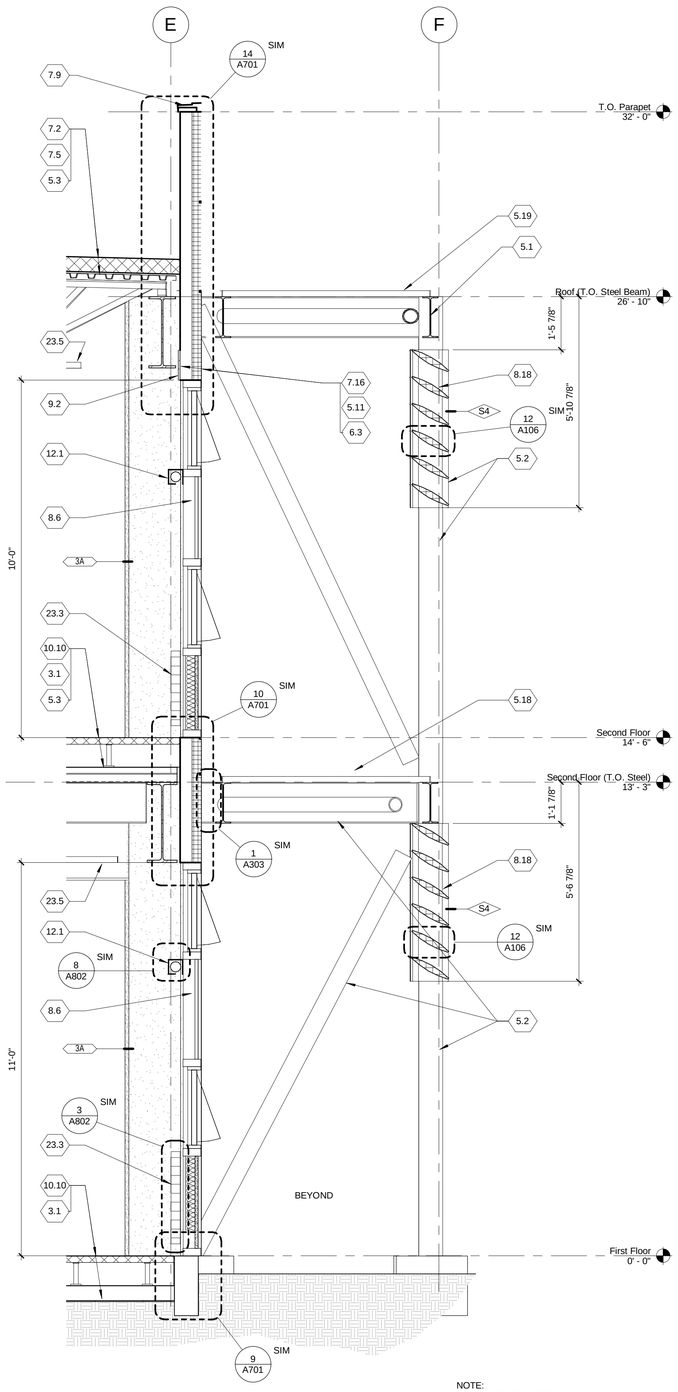
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NOTE:
SEE FLOOR PLAN FOR
CURTAIN WALL AND
GLAZING TYPES

2 NORTH EXTERIOR WALL SECTION

A501 | REF: A311 | SCALE: 1/2" = 1'-0"



NOTE:
SEE FLOOR PLAN FOR
CURTAIN WALL AND
GLAZING TYPES

1 SOUTH EXTERIOR WALL SECTION

A501 | REF: A311 | SCALE: 1/2" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
3.1 CAST IN PLACE CONCRETE
3.2 6" CONC HOUSEKEEPING PAD
3.3 VAPOR BARRIER
3.4 GRANULAR FILL
3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
5.1 STEEL BEAM
5.2 STEEL COLUMN
5.3 METAL DECK
5.4 STEEL ANGLE
5.5 STEEL PLATE
5.6 TUBULAR STEEL
5.7 STEEL BENT PLATE
5.8 STAINLESS STEEL FRAME
5.9 OPEN WEB STEEL JOIST
5.10 S.S. BOLLARD (6" SQ)
5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
5.12 CANE DETECTION RAIL
5.13 GUARDRAIL
5.14 STAINLESS STEEL HANDRAIL
5.15 METAL FRAMED STAIR
5.16 STEEL CHANNEL
5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
5.20 DECORATIVE METAL MESH VINESCREEN
5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
6.3 5/8" GLASS MAT FACED GYP SHEATHING
6.4 PLASTIC LAMINATE
6.5 SOLID-SURFACING MATERIAL COUNTERTOP
6.6 (NOT USED)
6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
7.2 PVC ROOFING
7.3 MEMBRANE EDGE FASTENER @ 12" O/C
7.4 1/4" PROTECTION BOARD
7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
7.6 BATT INSULATION R=19
7.7 PVC MEMBRANE FLASHING
7.8 EXTRUDED ALUM TRIM
7.9 ALUM FLASHING
7.10 FORMED SHEET SS COPING
7.11 BELOW GRADE DAMP/WATERPROOFING
7.12 SEALANT WITH BACKER ROD
7.13 20 GA GALVANIZED SPLASH PAN
7.14 DOWN SPOUT
7.15 WATERPROOFING MEMBRANE
7.16 INSULATED METAL PANEL CLADDING
7.17 PVC ROOF SEISMIC JOINT COVER
7.18 EXTERIOR WALL SEISMIC JOINT COVER
7.19 INTERIOR WALL SEISMIC JOINT COVER
7.20 CEILING SEISMIC JOINT COVER
7.21 FIRESTOPPING
7.22 SAND COATED ROOF WALKWAY
7.23 METAL SPANDREL PANEL (INSULATED)
7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
7.27 FLOOR SEISMIC JOINT COVER
7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
7.29 METAL PANEL SOFFIT
7.30 1" RIGID INSULATION BOARD
7.31 WATERPROOF TRAFFIC COATING
7.32 COMPRESSION SEAL
7.33 SILICONE SEALANT
7.34 NEOPRENE SPACER (BLACK).
7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
7.36 1/2" FOIL-BACKED RIGID INSULATION
7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
8.1 DOOR & FRAME
8.2 MOTORIZED OPERABLE WINDOW
8.3 MANUAL OPERABLE WINDOW
8.4 AUTOMATIC DOOR BOTTOM
8.5 THRESHOLD
8.6 GLAZED ALUM CURTAIN WALL SYSTEM
8.7 1" INSULATED GLAZING
8.8 FRITTED GLAZING
8.9 SPANDREL GLAZING
8.10 VISION GLASS (SAFETY WHERE REQUIRED)
8.11 (NOT USED)
8.12 AUTOMATIC ENTRANCE DOOR
8.13 SKYLIGHT
8.14 WEATHERSTRIPPING
8.15 MTL SECURITY GATE
8.16 DOOR PULL
8.17 AUTOMATIC DOOR OPERATOR
8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
9.1 1/2" GWB TYPE X
9.2 5/8" GWB TYPE X
9.3 1" GWB SHAFT LINER
9.4 20 GA MTL STUD @ 16" O/C
9.5 SLOTTED SLIP TRACK
9.6 METAL STUD TRACK
9.7 COLD FORMED FURRING CHANNEL
9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
9.9 FRAMING ANGLE, MIN 20 GA GALV
9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
9.11 SHAFT J RUNNER
9.12 CERAMIC TILE
9.13 REINFORCED MORTAR SETTING BED
9.14 SCHEDULED FLOORING
9.15 SUSPENDED GYP BOARD CEILING SYSTEM
9.16 SCHEDULED WALL BASE
9.17 PAINT
9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
9.20 3/4" RECLAIMED WOOD FLOORING
9.21 SOUND ATTENUATION BLANKET
9.22 ACOUSTICAL INSULATION 3" (UON)
9.23 SUSPENDED ACOUSTICAL CEILING
9.24 STONE TILE
9.25 RECLAIMED WOOD WALL PANEL
9.26 METAL COATINGS AND SEALER
9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
10.1 TOILET PARTITION
10.2 (NOT USED)
10.3 METAL LOCKER
10.4 FIRE EXTINGUISHER CABINET
10.5 DOOR STOP
10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
10.7 VINE SCREEN SYSTEM
10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
11.1 MOTORIZED PROJECTION SCREEN
11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
12.1 MOTORIZED WINDOW SHADE
12.2 SYSTEM FURNITURE, NIC
12.3 ENTRANCE FLOOR MAT & FRAME
12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
21.1 FIRE SPRINKLER HEAD
21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
22.1 ROOF DRAIN
22.2 NOT USED
22.3 VENT THROUGH ROOF
22.4 ELECTRIC WATER COOLER
22.5 KITCHEN SINK
22.6 SERVICE SINK
22.7 FLOOR DRAIN
22.8 FILTERED WATER SYSTEM FAUCET
22.9 DUAL FLUSH TOILET
22.10 HIGH EFFICIENCY TOILET
22.11 LOW CONSUMPTION URINAL
22.12 COUNTERTOP SINK
22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
22.14 HAND SHOWER SET WITH SLIDE BAR
22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
23.1 BOILER FLUE
23.2 DUCT
23.3 PERIMETER HYDRONIC HEATER
23.4 FIRE DAMPER
23.5 RADIANT CEILING PANEL
23.6 MECHANICAL SHAFT OPENING
23.7 RADIANT FLOOR SLAB SYSTEM
23.8 MECHANICAL PIPING
23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
26.1 LIGHT FIXTURE
26.2 CARD READER
26.3 PHOTOVOLTAIC INVERTER
26.4 POWER - DUPLEX
26.5 POWER - QUAD
26.6 POWER/DATA OUTLET COMBINATION
26.7 SWITCH
26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
32.1 CONCRETE PAVING

SCALE: 1/2" = 1'-0"
0' 1' 2' 4' 8'

PROJECT STATUS

BID SET 04/30/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

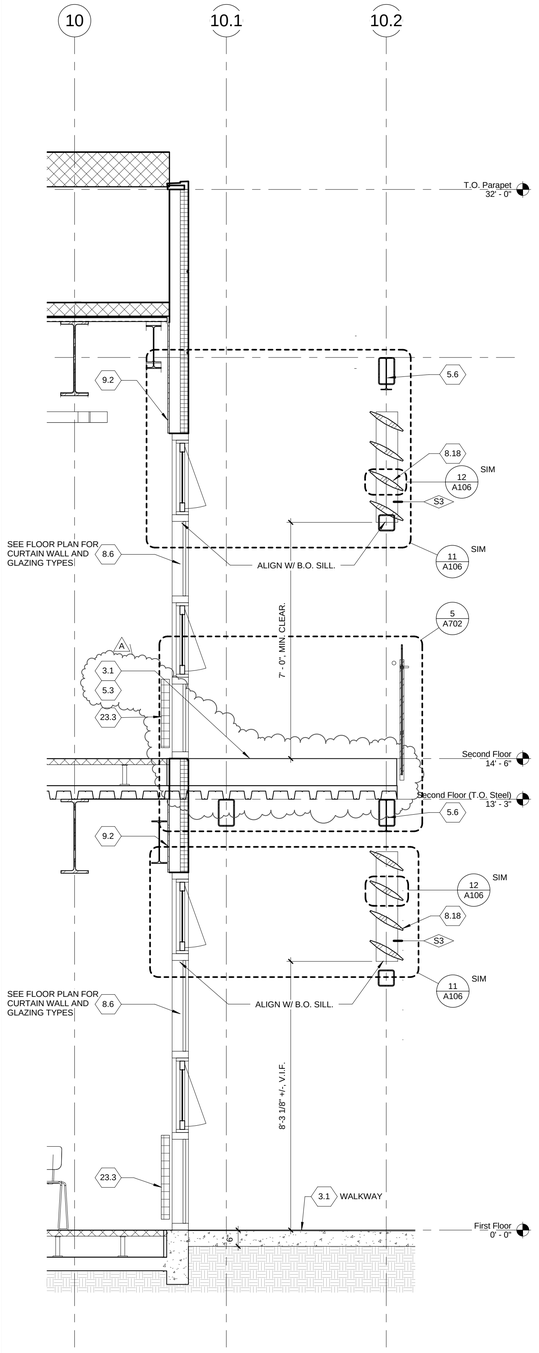
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

WALL SECTIONS

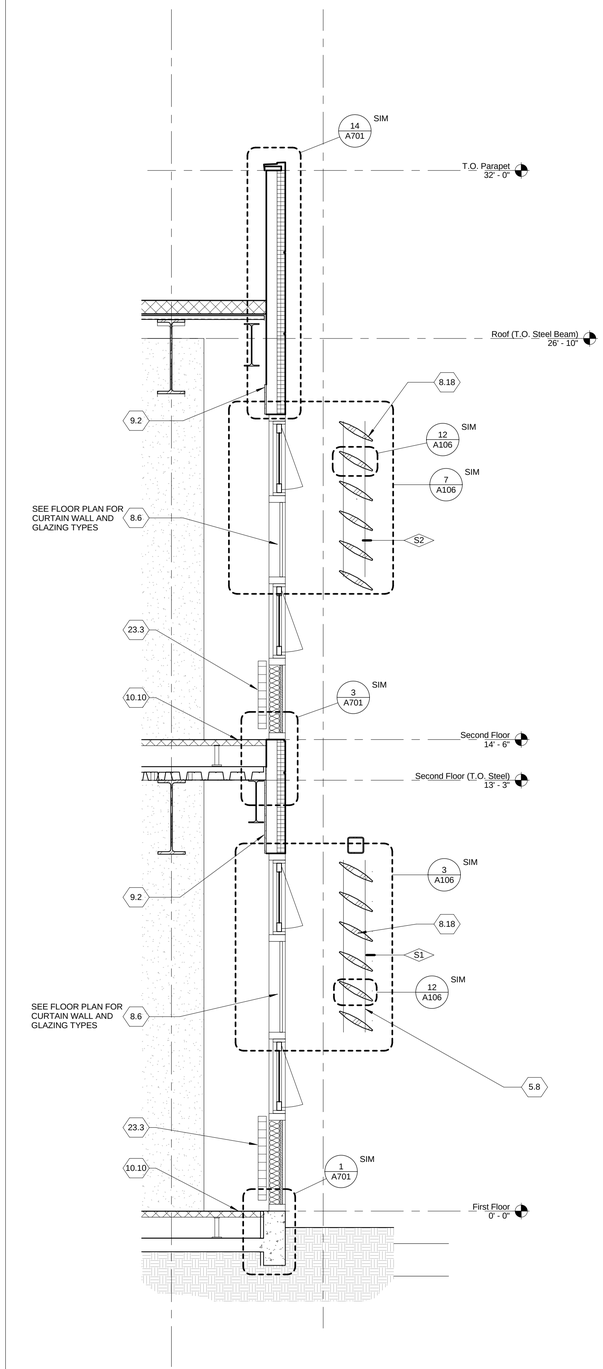
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SCALE		INDEX	SHEET OF

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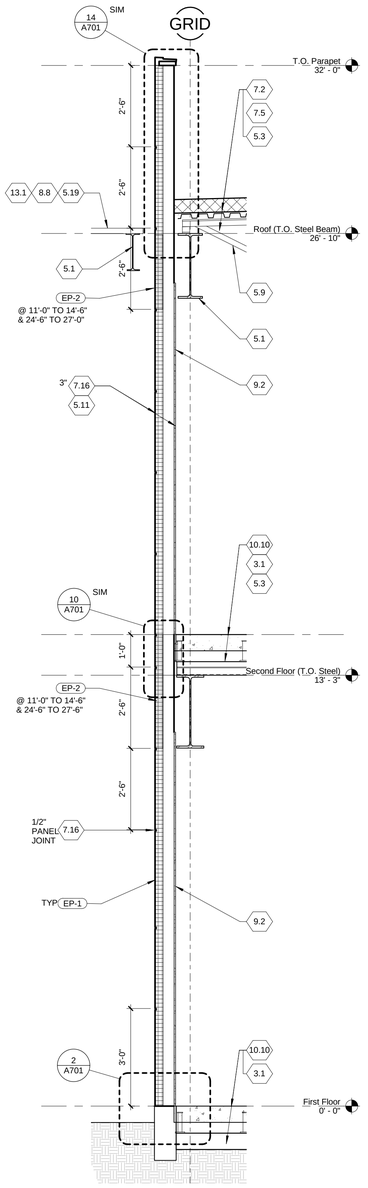
3 | A502 | SECTION @ EXTERIOR BALCONY

REF: A211 SCALE: 1/2" = 1'-0"



2 | A502 | SECTION @ EXTERIOR WING WALL

REF: A211 SCALE: 1/2" = 1'-0"



1 | A502 | WALL SECTION @ METAL PANEL W/ TYP PANEL DIMENSIONS

REF: A212 SCALE: 1/2" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
- 3.1 CAST IN PLACE CONCRETE
- 3.2 6" CONC HOUSEKEEPING PAD
- 3.3 VAPOR BARRIER
- 3.4 GRANULAR FILL
- 3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
- 5.1 STEEL BEAM
- 5.2 STEEL COLUMN
- 5.3 METAL DECK
- 5.4 STEEL ANGLE
- 5.5 STEEL PLATE
- 5.6 TUBULAR STEEL
- 5.7 STEEL BENT PLATE
- 5.8 STAINLESS STEEL FRAME
- 5.9 OPEN WEB STEEL JOIST
- 5.10 S.S. BOLLARD (6" SQ)
- 5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
- 5.12 CANE DETECTION RAIL
- 5.13 GUARDRAIL
- 5.14 STAINLESS STEEL HANDRAIL
- 5.15 METAL FRAMED STAIR
- 5.16 STEEL CHANNEL
- 5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
- 5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
- 5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
- 5.20 DECORATIVE METAL MESH VINESCREEN
- 5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
- 6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
- 6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
- 6.3 5/8" GLASS MAT FACED GYP SHEATHING
- 6.4 PLASTIC LAMINATE
- 6.5 SOLID-SURFACING MATERIAL COUNTERTOP
- 6.6 (NOT USED)
- 6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
- 7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
- 7.2 PVC ROOFING
- 7.3 MEMBRANE EDGE FASTENER @ 12" O/C
- 7.4 1/4" PROTECTION BOARD
- 7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
- 7.6 BATT INSULATION R=19
- 7.7 PVC MEMBRANE FLASHING
- 7.8 EXTRUDED ALUM TRIM
- 7.9 ALUM FLASHING
- 7.10 FORMED SHEET SS COPING
- 7.11 BELOW GRADE DAMP/WATERPROOFING
- 7.12 SEALANT WITH BACKER ROD
- 7.13 20 GA GALVANIZED SPLASH PAN
- 7.14 DOWN SPOUT
- 7.15 WATERPROOFING MEMBRANE
- 7.16 INSULATED METAL PANEL CLADDING
- 7.17 PVC ROOF SEISMIC JOINT COVER
- 7.18 EXTERIOR WALL SEISMIC JOINT COVER
- 7.19 INTERIOR WALL SEISMIC JOINT COVER
- 7.20 CEILING SEISMIC JOINT COVER
- 7.21 FIRESTOPPING
- 7.22 SAND COATED ROOF WALKWAY
- 7.23 METAL SPANDREL PANEL (INSULATED)
- 7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
- 7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
- 7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
- 7.27 FLOOR SEISMIC JOINT COVER
- 7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
- 7.29 METAL PANEL SOFFIT
- 7.30 1" RIGID INSULATION BOARD
- 7.31 WATERPROOF TRAFFIC COATING
- 7.32 COMPRESSION SEAL
- 7.33 SILICONE SEALANT
- 7.34 NEOPRENE SPACER (BLACK).
- 7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
- 7.36 1/2" FOIL-BACKED RIGID INSULATION
- 7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
- 8.1 DOOR & FRAME
- 8.2 MOTORIZED OPERABLE WINDOW
- 8.3 MANUAL OPERABLE WINDOW
- 8.4 AUTOMATIC DOOR BOTTOM
- 8.5 THRESHOLD
- 8.6 GLAZED ALUM CURTAIN WALL SYSTEM
- 8.7 1" INSULATED GLAZING
- 8.8 FRITTED GLAZING
- 8.9 SPANDREL GLAZING
- 8.10 VISION GLASS (SAFETY WHERE REQUIRED)
- 8.11 (NOT USED)
- 8.12 AUTOMATIC ENTRANCE DOOR
- 8.13 SKYLIGHT
- 8.14 WEATHERSTRIPPING
- 8.15 MTL SECURITY GATE
- 8.16 DOOR PULL
- 8.17 AUTOMATIC DOOR OPERATOR
- 8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
- 9.1 1/2" GWB TYPE X
- 9.2 5/8" GWB TYPE X
- 9.3 1" GWB SHAFT LINER
- 9.4 20 GA MTL STUD @ 16" O/C
- 9.5 SLOTTED SLIP TRACK
- 9.6 METAL STUD TRACK
- 9.7 COLD FORMED FURRING CHANNEL
- 9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
- 9.9 FRAMING ANGLE, MIN 20 GA GALV
- 9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
- 9.11 SHAFT J RUNNER
- 9.12 CERAMIC TILE
- 9.13 REINFORCED MORTAR SETTING BED
- 9.14 SCHEDULED FLOORING
- 9.15 SUSPENDED GYP BOARD CEILING SYSTEM
- 9.16 SCHEDULED WALL BASE
- 9.17 PAINT
- 9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
- 9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
- 9.20 3/4" RECLAIMED WOOD FLOORING
- 9.21 SOUND ATTENUATION BLANKET
- 9.22 ACOUSTICAL INSULATION 3" (UON)
- 9.23 SUSPENDED ACOUSTICAL CEILING
- 9.24 STONE TILE
- 9.25 RECLAIMED WOOD WALL PANEL
- 9.26 METAL COATINGS AND SEALER
- 9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
- 9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
- 10.1 TOILET PARTITION
- 10.2 (NOT USED)
- 10.3 METAL LOCKER
- 10.4 FIRE EXTINGUISHER CABINET
- 10.5 DOOR STOP
- 10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
- 10.7 VINE SCREEN SYSTEM
- 10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
- 10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
- 10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
- 10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
- 11.1 MOTORIZED PROJECTION SCREEN
- 11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
- 12.1 MOTORIZED WINDOW SHADE
- 12.2 SYSTEM FURNITURE, NIC
- 12.3 ENTRANCE FLOOR MAT & FRAME
- 12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
- 13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
- 14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
- 21.1 FIRE SPRINKLER HEAD
- 21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
- 22.1 ROOF DRAIN
- 22.2 NOT USED
- 22.3 VENT THROUGH ROOF
- 22.4 ELECTRIC WATER COOLER
- 22.5 KITCHEN SINK
- 22.6 SERVICE SINK
- 22.7 FLOOR DRAIN
- 22.8 FILTERED WATER SYSTEM FAUCET
- 22.9 DUAL FLUSH TOILET
- 22.10 HIGH EFFICIENCY TOILET
- 22.11 LOW CONSUMPTION URINAL
- 22.12 COUNTERTOP SINK
- 22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
- 22.14 HAND SHOWER SET WITH SLIDE BAR
- 22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
- 23.1 BOILER FLUE
- 23.2 DUCT
- 23.3 PERIMETER HYDRONIC HEATER
- 23.4 FIRE DAMPER
- 23.5 RADIANT CEILING PANEL
- 23.6 MECHANICAL SHAFT OPENING
- 23.7 RADIANT FLOOR SLAB SYSTEM
- 23.8 MECHANICAL PIPING
- 23.9 ROOF-MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
- 26.1 LIGHT FIXTURE
- 26.2 CARD READER
- 26.3 PHOTOVOLTAIC INVERTER
- 26.4 POWER - DUPLEX
- 26.5 POWER - QUAD
- 26.6 POWER/DATA OUTLET COMBINATION
- 26.7 SWITCH
- 26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
- 28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
- 32.1 CONCRETE PAVING

PROJECT STATUS

PROPOSAL SET 07/23/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REVISE METAL GRATE BALCONY TO BE METAL DECK WITH CONCRETE	JG

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

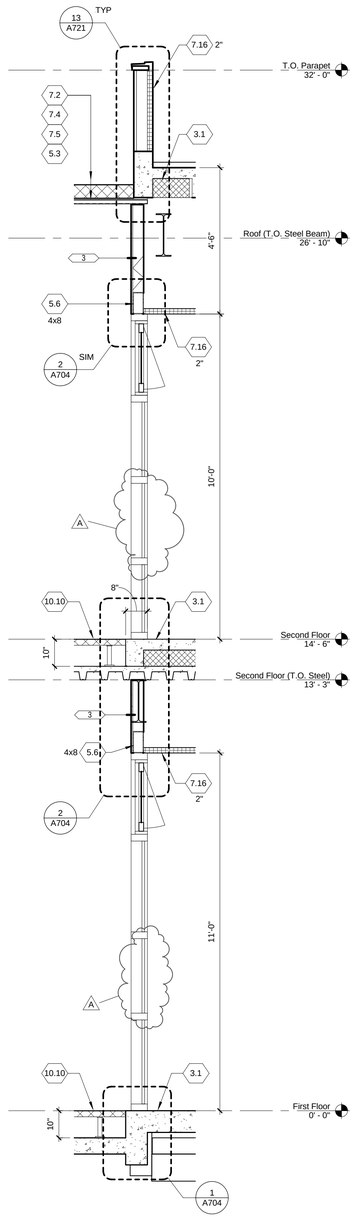
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

WALL SECTIONS

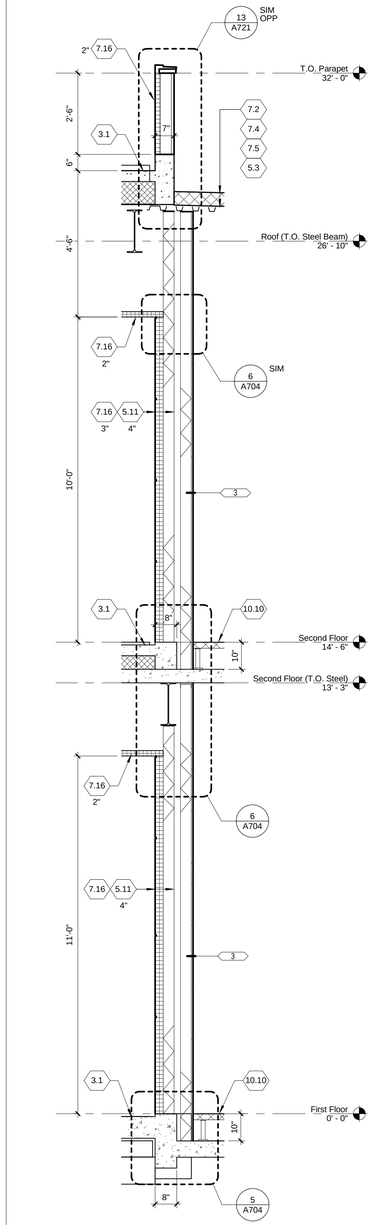
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SCALE	INDEX	SHEET	OF

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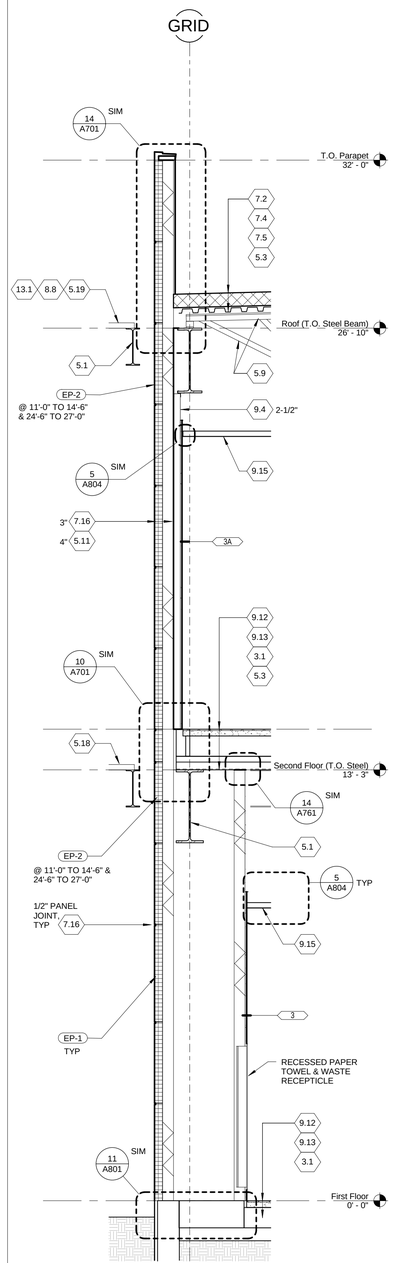
9 | A503 | WALL SECTION @ STAIR 3 CURTAIN WALL SIDE (STAIR 2 SIM)

REF: A622, A623 SCALE: 1/2" = 1'-0"



5 | A503 | WALL SECTION @ STAIR 3 PANEL SIDE (STAIR 2 SIM)

REF: A622, A623 SCALE: 1/2" = 1'-0"



1 | A503 | WALL SECTION @ RESTROOMS

REF: A211 SCALE: 1/2" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
- 3.1 CAST IN PLACE CONCRETE
- 3.2 6" CONC HOUSEKEEPING PAD
- 3.3 VAPOR BARRIER
- 3.4 GRANULAR FILL
- 3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
- 5.1 STEEL BEAM
- 5.2 STEEL COLUMN
- 5.3 METAL DECK
- 5.4 STEEL ANGLE
- 5.5 STEEL PLATE
- 5.6 TUBULAR STEEL
- 5.7 STEEL BENT PLATE
- 5.8 STAINLESS STEEL FRAME
- 5.9 OPEN WEB STEEL JOIST
- 5.10 S.S. BOLLARD (6" SQ)
- 5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
- 5.12 CANE DETECTION RAIL
- 5.13 GUARDRAIL
- 5.14 STAINLESS STEEL HANDRAIL
- 5.15 METAL FRAMED STAIR
- 5.16 STEEL CHANNEL
- 5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
- 5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
- 5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
- 5.20 DECORATIVE METAL MESH VINESCREEN
- 5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
- 6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
- 6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
- 6.3 5/8" GLASS MAT FACED GYP SHEATHING
- 6.4 PLASTIC LAMINATE
- 6.5 SOLID-SURFACING MATERIAL COUNTERTOP
- 6.6 (NOT USED)
- 6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
- 7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
- 7.2 PVC ROOFING
- 7.3 MEMBRANE EDGE FASTENER @ 12" O/C
- 7.4 1/4" PROTECTION BOARD
- 7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
- 7.6 BATT INSULATION R=19
- 7.7 PVC MEMBRANE FLASHING
- 7.8 EXTRUDED ALUM TRIM
- 7.9 ALUM FLASHING
- 7.10 FORMED SHEET SS COPING
- 7.11 BELOW GRADE DAMP/WATERPROOFING
- 7.12 SEALANT WITH BACKER ROD
- 7.13 20 GA GALVANIZED SPLASH PAN
- 7.14 DOWN SPOUT
- 7.15 WATERPROOFING MEMBRANE
- 7.16 INSULATED METAL PANEL CLADDING
- 7.17 PVC ROOF SEISMIC JOINT COVER
- 7.18 EXTERIOR WALL SEISMIC JOINT COVER
- 7.19 INTERIOR WALL SEISMIC JOINT COVER
- 7.20 CEILING SEISMIC JOINT COVER
- 7.21 FIRESTOPPING
- 7.22 SAND COATED ROOF WALKWAY
- 7.23 METAL SPANDREL PANEL (INSULATED)
- 7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
- 7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
- 7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
- 7.27 FLOOR SEISMIC JOINT COVER
- 7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
- 7.29 METAL PANEL SOFFIT
- 7.30 1" RIGID INSULATION BOARD
- 7.31 WATERPROOF TRAFFIC COATING
- 7.32 COMPRESSION SEAL
- 7.33 SILICONE SEALANT
- 7.34 NEOPRENE SPACER (BLACK).
- 7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
- 7.36 1/2" FOIL-BACKED RIGID INSULATION
- 7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
- 8.1 DOOR & FRAME
- 8.2 MOTORIZED OPERABLE WINDOW
- 8.3 MANUAL OPERABLE WINDOW
- 8.4 AUTOMATIC DOOR BOTTOM
- 8.5 THRESHOLD
- 8.6 GLAZED ALUM CURTAIN WALL SYSTEM
- 8.7 1" INSULATED GLAZING
- 8.8 FRITTED GLAZING
- 8.9 SPANDREL GLAZING
- 8.10 VISION GLASS (SAFETY WHERE REQUIRED)
- 8.11 (NOT USED)
- 8.12 AUTOMATIC ENTRANCE DOOR
- 8.13 SKYLIGHT
- 8.14 WEATHERSTRIPPING
- 8.15 MTL SECURITY GATE
- 8.16 DOOR PULL
- 8.17 AUTOMATIC DOOR OPERATOR
- 8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
- 9.1 1/2" GWB TYPE X
- 9.2 5/8" GWB TYPE X
- 9.3 1" GWB SHAFT LINER
- 9.4 20 GA MTL STUD @ 16" O/C
- 9.5 SLOTTED SLIP TRACK
- 9.6 METAL STUD TRACK
- 9.7 COLD FORMED FURRING CHANNEL
- 9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
- 9.9 FRAMING ANGLE, MIN 20 GA GALV
- 9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
- 9.11 SHAFT J RUNNER
- 9.12 CERAMIC TILE
- 9.13 REINFORCED MORTAR SETTING BED
- 9.14 SCHEDULED FLOORING
- 9.15 SUSPENDED GYP BOARD CEILING SYSTEM
- 9.16 SCHEDULED WALL BASE
- 9.17 PAINT
- 9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
- 9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
- 9.20 3/4" RECLAIMED WOOD FLOORING
- 9.21 SOUND ATTENUATION BLANKET
- 9.22 ACOUSTICAL INSULATION 3" (UON)
- 9.23 SUSPENDED ACOUSTICAL CEILING
- 9.24 STONE TILE
- 9.25 RECLAIMED WOOD WALL PANEL
- 9.26 METAL COATINGS AND SEALER
- 9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
- 9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
- 10.1 TOILET PARTITION
- 10.2 (NOT USED)
- 10.3 METAL LOCKER
- 10.4 FIRE EXTINGUISHER CABINET
- 10.5 DOOR STOP
- 10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
- 10.7 VINE SCREEN SYSTEM
- 10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
- 10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
- 10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
- 10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
- 11.1 MOTORIZED PROJECTION SCREEN
- 11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
- 12.1 MOTORIZED WINDOW SHADE
- 12.2 SYSTEM FURNITURE, NIC
- 12.3 ENTRANCE FLOOR MAT & FRAME
- 12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
- 13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
- 14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
- 21.1 FIRE SPRINKLER HEAD
- 21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
- 22.1 ROOF DRAIN
- 22.2 NOT USED
- 22.3 VENT THROUGH ROOF
- 22.4 ELECTRIC WATER COOLER
- 22.5 KITCHEN SINK
- 22.6 SERVICE SINK
- 22.7 FLOOR DRAIN
- 22.8 FILTERED WATER SYSTEM FAUCET
- 22.9 DUAL FLUSH TOILET
- 22.10 HIGH EFFICIENCY TOILET
- 22.11 LOW CONSUMPTION URINAL
- 22.12 COUNTERTOP SINK
- 22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
- 22.14 HAND SHOWER SET WITH SLIDE BAR
- 22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
- 23.1 BOILER FLUE
- 23.2 DUCT
- 23.3 PERIMETER HYDRONIC HEATER
- 23.4 FIRE DAMPER
- 23.5 RADIANT CEILING PANEL
- 23.6 MECHANICAL SHAFT OPENING
- 23.7 RADIANT FLOOR SLAB SYSTEM
- 23.8 MECHANICAL PIPING
- 23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
- 26.1 LIGHT FIXTURE
- 26.2 CARD READER
- 26.3 PHOTOVOLTAIC INVERTER
- 26.4 POWER - DUPLEX
- 26.5 POWER - QUAD
- 26.6 POWER/DATA OUTLET COMBINATION
- 26.7 SWITCH
- 26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
- 28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
- 32.1 CONCRETE PAVING

PROJECT STATUS

PROPOSAL SET 07/23/09

ISSUE

MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	REMOVE LOWER OPERABLE WINDOW AT STAIR	JG

		DATE
DRAWN	G JOHNSON	
DESIGNED	R PRADHAN	
CHECKED	W JOFFRION	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

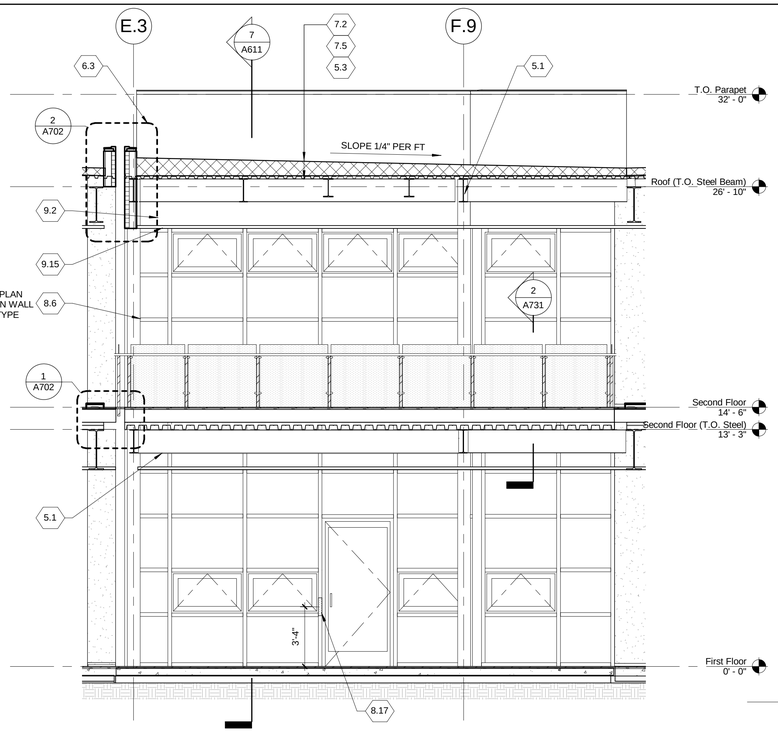
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

WALL SECTIONS

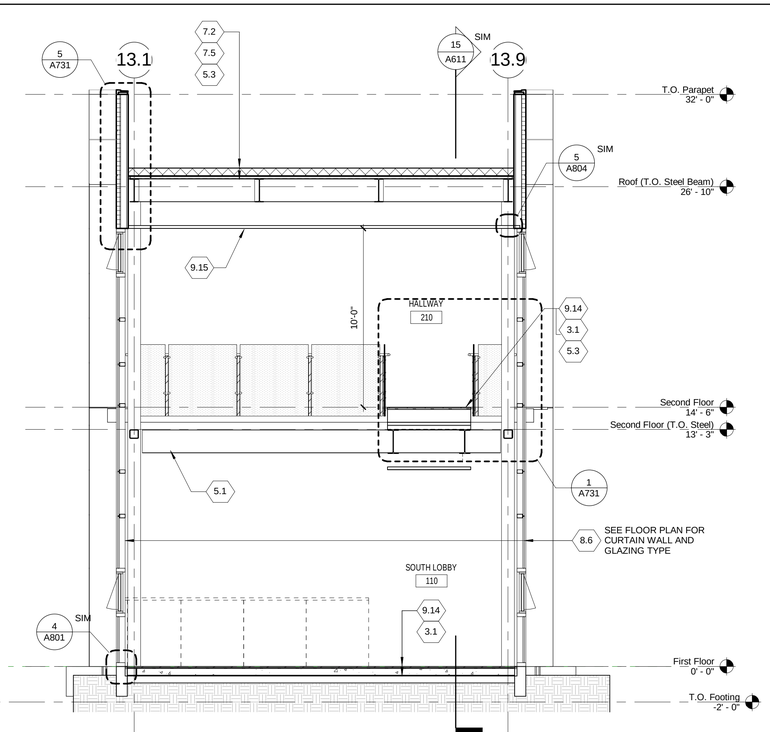
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SCALE	INDEX	SHEET OF	

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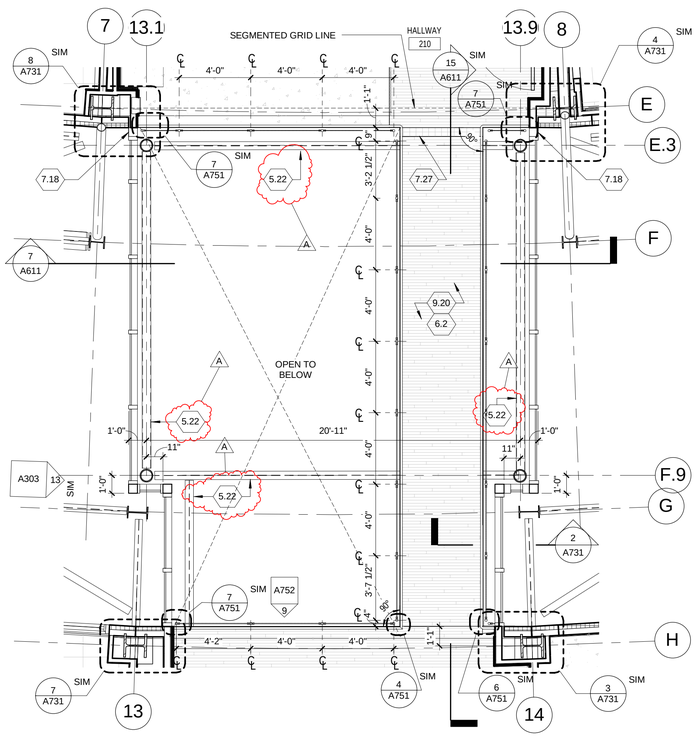
15 LONGITUDINAL SECTION @ CONNECTOR (LOOKING EAST)

A611 | REF: A311 | SCALE: 1/4" = 1'-0"



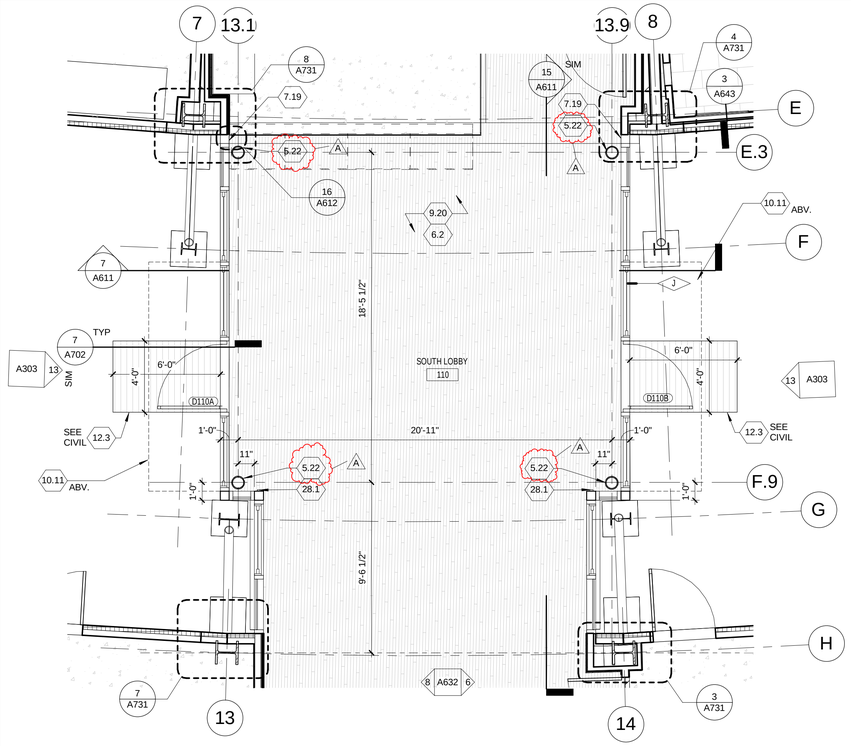
7 CROSS SECTION @ CONNECTOR (LOOKING NORTH)

A611 | REF: A231 | SCALE: 1/4" = 1'-0"



13 ENLARGED CONNECTOR PLAN- SECOND FLOOR

A611 | REF: A222 | SCALE: 1/4" = 1'-0"



5 ENLARGED CONNECTOR PLAN- FIRST FLOOR

A611 | REF: A211 | SCALE: 1/4" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
- 3.1 CAST IN PLACE CONCRETE
- 3.2 6" CONC HOUSEKEEPING PAD
- 3.3 VAPOR BARRIER
- 3.4 GRANULAR FILL
- 3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
- 5.1 STEEL BEAM
- 5.2 STEEL COLUMN
- 5.3 METAL DECK
- 5.4 STEEL ANGLE
- 5.5 STEEL PLATE
- 5.6 TUBULAR STEEL
- 5.7 STEEL BENT PLATE
- 5.8 STAINLESS STEEL FRAME
- 5.9 OPEN WEB STEEL JOIST
- 5.10 S.S. BOLLARD (6" SQ)
- 5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
- 5.12 CANE DETECTION RAIL
- 5.13 GUARDRAIL
- 5.14 STAINLESS STEEL HANDRAIL
- 5.15 METAL FRAMED STAIR
- 5.16 STEEL CHANNEL
- 5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
- 5.18 ALUMINUM FLOOR BAR GRATING **(BID OPTION #3A)**
- 5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
- 5.20 DECORATIVE METAL MESH VINESCREEN
- 5.21 STAINLESS STEEL BOLTS AND CAPS
- 5.22 ARCHITECTURALLY EXPOSED STRUCTURAL STEEL

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
- 6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
- 6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
- 6.3 5/8" GLASS MAT FACED GYP SHEATHING
- 6.4 PLASTIC LAMINATE
- 6.5 SOLID-SURFACING MATERIAL COUNTERTOP
- 6.6 (NOT USED)
- 6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
- 7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
- 7.2 PVC ROOFING
- 7.3 MEMBRANE EDGE FASTENER @ 12" O/C
- 7.4 1/4" PROTECTION BOARD
- 7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
- 7.6 BATT INSULATION R=19
- 7.7 PVC MEMBRANE FLASHING
- 7.8 EXTRUDED ALUM TRIM
- 7.9 ALUM FLASHING
- 7.10 FORMED SHEET SS COPING
- 7.11 BELOW GRADE DAMPPWATERPROOFING
- 7.12 SEALANT WITH BACKER ROD
- 7.13 20 GA GALVANIZED SPLASH PAN
- 7.14 DOWN SPOUT
- 7.15 WATERPROOFING MEMBRANE
- 7.16 INSULATED METAL PANEL CLADDING
- 7.17 PVC ROOF SEISMIC JOINT COVER
- 7.18 EXTERIOR WALL SEISMIC JOINT COVER
- 7.19 INTERIOR WALL SEISMIC JOINT COVER
- 7.20 CEILING SEISMIC JOINT COVER
- 7.21 FIRESTOPPING
- 7.22 SAND COATED ROOF WALKWAY
- 7.23 METAL SPANDREL PANEL (INSULATED)
- 7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
- 7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
- 7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
- 7.27 FLOOR SEISMIC JOINT COVER
- 7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
- 7.29 METAL PANEL SOFFIT
- 7.30 1" RIGID INSULATION BOARD
- 7.31 WATERPROOF TRAFFIC COATING
- 7.32 COMPRESSION SEAL
- 7.33 SILICONE SEALANT
- 7.34 NEOPRENE SPACER (BLACK).
- 7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
- 7.36 1/2" FOIL-BACKED RIGID INSULATION
- 7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
- 8.1 DOOR & FRAME
- 8.2 MOTORIZED OPERABLE WINDOW
- 8.3 MANUAL OPERABLE WINDOW
- 8.4 AUTOMATIC DOOR BOTTOM
- 8.5 THRESHOLD
- 8.6 GLAZED ALUM CURTAIN WALL SYSTEM
- 8.7 1" INSULATED GLAZING
- 8.8 FRITTED GLAZING
- 8.9 SPANDREL GLAZING
- 8.10 VISION GLASS (SAFETY WHERE REQUIRED)
- 8.11 (NOT USED)
- 8.12 AUTOMATIC ENTRANCE DOOR
- 8.13 SKYLIGHT
- 8.14 WEATHERSTRIPPING
- 8.15 MTL SECURITY GATE
- 8.16 DOOR PULL
- 8.17 AUTOMATIC DOOR OPERATOR
- 8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
- 9.1 1/2" GWB TYPE X
- 9.2 5/8" GWB TYPE X
- 9.3 1" GWB SHAFT LINER
- 9.4 20 GA MTL STUD @ 16" O/C
- 9.5 SLOTTED SLIP TRACK
- 9.6 METAL STUD TRACK
- 9.7 COLD FORMED FURRING CHANNEL
- 9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
- 9.9 FRAMING ANGLE, MIN 20 GA GALV
- 9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
- 9.11 SHAFT J RUNNER
- 9.12 CERAMIC TILE
- 9.13 REINFORCED MORTAR SETTING BED
- 9.14 SCHEDULED FLOORING
- 9.15 SUSPENDED GYP BOARD CEILING SYSTEM
- 9.16 SCHEDULED WALL BASE
- 9.17 PAINT
- 9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
- 9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
- 9.20 3/4" RECLAIMED WOOD FLOORING
- 9.21 SOUND ATTENUATION BLANKET
- 9.22 ACOUSTICAL INSULATION 3" (UON)
- 9.23 SUSPENDED ACOUSTICAL CEILING
- 9.24 STONE TILE
- 9.25 RECLAIMED WOOD WALL PANEL
- 9.26 METAL COATINGS AND SEALER
- 9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
- 9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
- 10.1 TOILET PARTITION
- 10.2 (NOT USED)
- 10.3 METAL LOCKER
- 10.4 FIRE EXTINGUISHER CABINET
- 10.5 DOOR STOP
- 10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
- 10.7 VINE SCREEN SYSTEM
- 10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
- 10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
- 10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
- 10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
- 11.1 MOTORIZED PROJECTION SCREEN
- 11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
- 12.1 MOTORIZED WINDOW SHADE
- 12.2 SYSTEM FURNITURE, NIC
- 12.3 ENTRANCE FLOOR MAT & FRAME
- 12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
- 13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
- 14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
- 21.1 FIRE SPRINKLER HEAD
- 21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
- 22.1 ROOF DRAIN
- 22.2 NOT USED
- 22.3 VENT THROUGH ROOF
- 22.4 ELECTRIC WATER COOLER
- 22.5 KITCHEN SINK
- 22.6 SERVICE SINK
- 22.7 FLOOR DRAIN
- 22.8 FILTERED WATER SYSTEM FAUCET
- 22.9 DUAL FLUSH TOILET
- 22.10 HIGH EFFICIENCY TOILET
- 22.11 LOW CONSUMPTION URINAL
- 22.12 COUNTERTOP SINK
- 22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
- 22.14 HAND SHOWER SET WITH SLIDE BAR
- 22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
- 23.1 BOILER FLUE
- 23.2 DUCT
- 23.3 PERIMETER HYDRONIC HEATER
- 23.4 FIRE DAMPER
- 23.5 RADIANT CEILING PANEL
- 23.6 MECHANICAL SHAFT OPENING
- 23.7 RADIANT FLOOR SLAB SYSTEM
- 23.8 MECHANICAL PIPING
- 23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
- 26.1 LIGHT FIXTURE
- 26.2 CARD READER
- 26.3 PHOTOVOLTAIC INVERTER
- 26.4 POWER - DUPLEX
- 26.5 POWER - QUAD
- 26.6 POWER/DATA OUTLET COMBINATION
- 26.7 SWITCH
- 26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
- 28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
- 32.1 CANOPY TYP. FAMILY

SCALE: 1/4" = 1'-0"
0' 2' 4' 8' 16'

PROJECT STATUS

BID SET 05/26/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	05/26/09	EXPOSED STRUCTRUCTURAL STEEL RE-CLASSIFICATION	JG

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

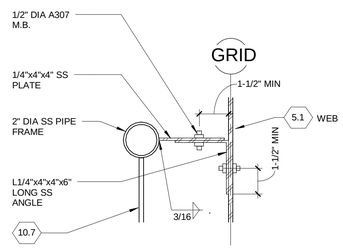
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

ENLARGED PLAN, ELEVATION & SECTION - CONNECTOR

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SCALE	INDEX	SHEET OF	

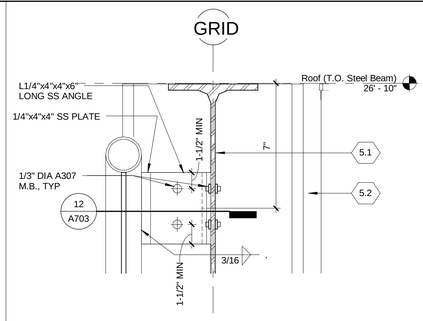
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12 | A703 | REF: A703

VINE SCREEN DETAIL PLAN VIEW @ ROOF (SECOND FLOOR SIM)

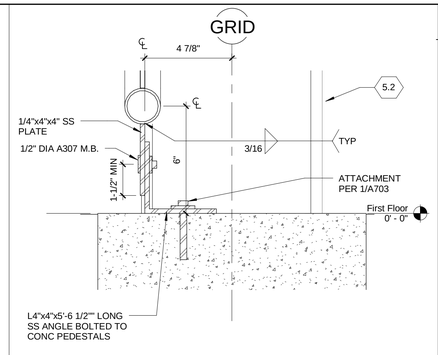
SCALE: 3" = 1'-0"



8 | A703 | REF: A703

VINE SCREEN DETAIL @ ROOF (SECOND FLOOR SIM)

SCALE: 3" = 1'-0"



4 | A703 | REF: A703

VINE SCREEN DETAL @ SLAB

SCALE: 3" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

X.X ITEM CODE

DIVISION 03 - CONCRETE
- 3.1 CAST IN PLACE CONCRETE
- 3.2 6" CONC HOUSEKEEPING PAD
- 3.3 VAPOR BARRIER
- 3.4 GRANULAR FILL
- 3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
- 5.1 STEEL BEAM
- 5.2 STEEL COLUMN
- 5.3 METAL DECK
- 5.4 STEEL ANGLE
- 5.5 STEEL PLATE
- 5.6 TUBULAR STEEL
- 5.7 STEEL BENT PLATE
- 5.8 STAINLESS STEEL FRAME
- 5.9 OPEN WEB STEEL JOIST
- 5.10 S.S. BOLLARD (6" SQ)
- 5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
- 5.12 CANE DETECTION RAIL
- 5.13 GUARDRAIL
- 5.14 STAINLESS STEEL HANDRAIL
- 5.15 METAL FRAMED STAIR
- 5.16 STEEL CHANNEL
- 5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
- 5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
- 5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
- 5.20 DECORATIVE METAL MESH VINESCREEN
- 5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
- 6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
- 6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
- 6.3 5/8" GLASS MAT FACED GYP SHEATHING
- 6.4 PLASTIC LAMINATE
- 6.5 SOLID-SURFACING MATERIAL COUNTERTOP
- 6.6 (NOT USED)
- 6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
- 7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
- 7.2 PVC ROOFING
- 7.3 MEMBRANE EDGE FASTENER @ 12" O/C
- 7.4 1/4" PROTECTION BOARD
- 7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
- 7.6 BATT INSULATION R=19
- 7.7 PVC MEMBRANE FLASHING
- 7.8 EXTRUDED ALUM TRIM
- 7.9 ALUM FLASHING
- 7.10 FORMED SHEET SS COPING
- 7.11 BELOW GRADE DAMP/WATERPROOFING
- 7.12 SEALANT WITH BACKER ROD
- 7.13 20 GA GALVANIZED SPLASH PAN
- 7.14 DOWN SPOUT
- 7.15 WATERPROOFING MEMBRANE
- 7.16 INSULATED METAL PANEL CLADDING
- 7.17 PVC ROOF SEISMIC JOINT COVER
- 7.18 EXTERIOR WALL SEISMIC JOINT COVER
- 7.19 INTERIOR WALL SEISMIC JOINT COVER
- 7.20 CEILING SEISMIC JOINT COVER
- 7.21 FIRESTOPPING
- 7.22 SAND COATED ROOF WALKWAY
- 7.23 METAL SPANDREL PANEL (INSULATED)
- 7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
- 7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
- 7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
- 7.27 FLOOR SEISMIC JOINT COVER
- 7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
- 7.29 METAL PANEL SOFFIT
- 7.30 1" RIGID INSULATION BOARD
- 7.31 WATERPROOF TRAFFIC COATING
- 7.32 COMPRESSION SEAL
- 7.33 SILICONE SEALANT
- 7.34 NEOPRENE SPACER (BLACK).
- 7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
- 7.36 1/2" FOIL-BACKED RIGID INSULATION
- 7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
- 8.1 DOOR & FRAME
- 8.2 MOTORIZED OPERABLE WINDOW
- 8.3 MANUAL OPERABLE WINDOW
- 8.4 AUTOMATIC DOOR BOTTOM
- 8.5 THRESHOLD
- 8.6 GLAZED ALUM CURTAIN WALL SYSTEM
- 8.7 1" INSULATED GLAZING
- 8.8 FRITTED GLAZING
- 8.9 SPANDREL GLAZING
- 8.10 VISION GLASS (SAFETY WHERE REQUIRED)
- 8.11 (NOT USED)
- 8.12 AUTOMATIC ENTRANCE DOOR
- 8.13 SKYLIGHT
- 8.14 WEATHERSTRIPPING
- 8.15 MTL SECURITY GATE
- 8.16 DOOR PULL
- 8.17 AUTOMATIC DOOR OPERATOR
- 8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

DIVISION 09 - FINISHES
- 9.1 1/2" GWB TYPE X
- 9.2 5/8" GWB TYPE X
- 9.3 1" GWB SHAFT LINER
- 9.4 20 GA MTL STUD @ 16" O/C
- 9.5 SLOTTED SLIP TRACK
- 9.6 METAL STUD TRACK
- 9.7 COLD FORMED FURRING CHANNEL
- 9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
- 9.9 FRAMING ANGLE, MIN 20 GA GALV
- 9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
- 9.11 SHAFT J RUNNER
- 9.12 CERAMIC TILE
- 9.13 REINFORCED MORTAR SETTING BED
- 9.14 SCHEDULED FLOORING
- 9.15 SUSPENDED GYP BOARD CEILING SYSTEM
- 9.16 SCHEDULED WALL BASE
- 9.17 PAINT
- 9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
- 9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
- 9.20 3/4" RECLAIMED WOOD FLOORING
- 9.21 SOUND ATTENUATION BLANKET
- 9.22 ACOUSTICAL INSULATION 3" (UON)
- 9.23 SUSPENDED ACOUSTICAL CEILING
- 9.24 STONE TILE
- 9.25 RECLAIMED WOOD WALL PANEL
- 9.26 METAL COATINGS AND SEALER
- 9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
- 9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
- 10.1 TOILET PARTITION
- 10.2 (NOT USED)
- 10.3 METAL LOCKER
- 10.4 FIRE EXTINGUISHER CABINET
- 10.5 DOOR STOP
- 10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
- 10.7 VINE SCREEN SYSTEM
- 10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
- 10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
- 10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
- 10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
- 11.1 MOTORIZED PROJECTION SCREEN
- 11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
- 12.1 MOTORIZED WINDOW SHADE
- 12.2 SYSTEM FURNITURE, NIC
- 12.3 ENTRANCE FLOOR MAT & FRAME
- 12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
- 13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
- 14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
- 21.1 FIRE SPRINKLER HEAD
- 21.2 FIRE SPRINKLER PIPING

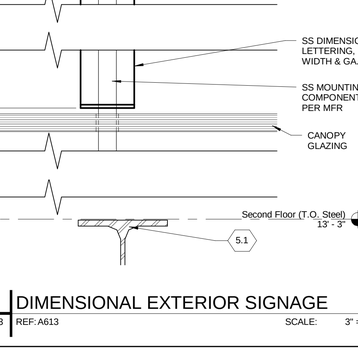
DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
- 22.1 ROOF DRAIN
- 22.2 NOT USED
- 22.3 VENT THROUGH ROOF
- 22.4 ELECTRIC WATER COOLER
- 22.5 KITCHEN SINK
- 22.6 SERVICE SINK
- 22.7 FLOOR DRAIN
- 22.8 FILTERED WATER SYSTEM FAUCET
- 22.9 DUAL FLUSH TOILET
- 22.10 HIGH EFFICIENCY TOILET
- 22.11 LOW CONSUMPTION URINAL
- 22.12 COUNTERTOP SINK
- 22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
- 22.14 HAND SHOWER SET WITH SLIDE BAR
- 22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
- 23.1 BOILER FLUE
- 23.2 DUCT
- 23.3 PERIMETER HYDRONIC HEATER
- 23.4 FIRE DAMPER
- 23.5 RADIANT CEILING PANEL
- 23.6 MECHANICAL SHAFT OPENING
- 23.7 RADIANT FLOOR SLAB SYSTEM
- 23.8 MECHANICAL PIPING
- 23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
- 26.1 LIGHT FIXTURE
- 26.2 CARD READER
- 26.3 PHOTOVOLTAIC INVERTER
- 26.4 POWER - DUPLEX
- 26.5 POWER - QUAD
- 26.6 POWER/DATA OUTLET COMBINATION
- 26.7 SWITCH
- 26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
- 28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
- 32.1 CONCRETE PAVING



10 | A703 | REF: A211

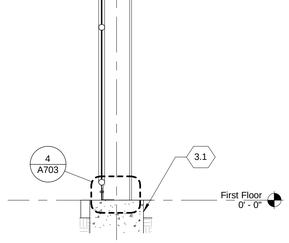
VINE SCREEN SYSTEM PLAN DETAIL

SCALE: 1" = 1'-0"

9 | A703 | REF: A613

DIMENSIONAL EXTERIOR SIGNAGE

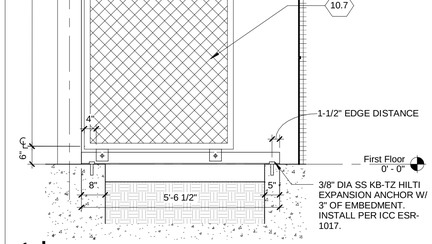
SCALE: 3" = 1'-0"



5 | A703 | REF: A703

VINE SCREEN SYSTEM SECTION

SCALE: 1/2" = 1'-0"



1 | A703 | REF: A301

VINE SCREEN SYSTEM ELEVATION

SCALE: 1/2" = 1'-0"

PROJECT STATUS

BID SET 04/30/09

ISSUE

MARK	DATE	DESCRIPTION	INITIAL

DRAWN	G JOHNSON	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

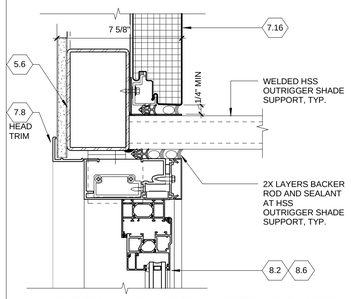
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

EXTERIOR DETAILS

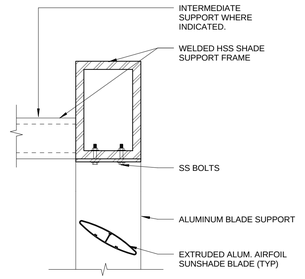
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SCALE		INDEX	SHEET OF

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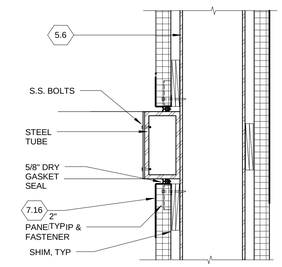
8 VERTICAL SHADE - INTERMEDIATE CONNECTION AT WALL

A705 | REF: A106 | SCALE: 3" = 1'-0"



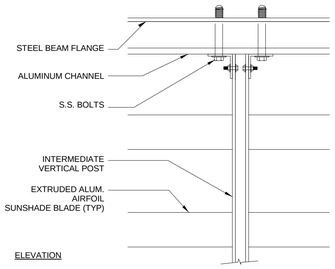
4 VERTICAL SHADE (EAST / WEST FACADE) - HEAD

A705 | REF: A106 | SCALE: 3" = 1'-0"



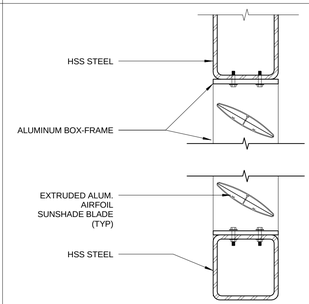
3 VERTICAL SHADE CONNECTION AT FIN WALLS

A705 | REF: A106 | SCALE: 1 1/2" = 1'-0"



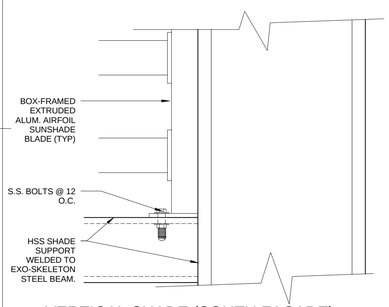
5 VERTICAL SHADE - INTERMEDIATE POST

A705 | REF: A106 | SCALE: 3" = 1'-0"



2 VERTICAL SHADE (SOUTH FACADE) - HEAD & SILL, TYP.

A705 | REF: A106 | SCALE: 3" = 1'-0"



1 VERTICAL SHADE (SOUTH FACADE) - SILL/HEAD

A705 | REF: A106 | SCALE: 3" = 1'-0"

KEYNOTES

NOTE: CONTRACTOR TO REFER TO SHEET A105 FOR FINISHES AND SPECIFICATIONS FOR FURTHER INFORMATION ON PRODUCTS LISTED.

x.x ITEM CODE

DIVISION 03 - CONCRETE
3.1 CAST IN PLACE CONCRETE
3.2 6" CONC HOUSEKEEPING PAD
3.3 VAPOR BARRIER
3.4 GRANULAR FILL
3.5 CANE DETECTION AREA - SMOOTH PEBBLE STONE IN CONC. TOPPING.

DIVISION 05 - METALS
5.1 STEEL BEAM
5.2 STEEL COLUMN
5.3 METAL DECK
5.4 STEEL ANGLE
5.5 STEEL PLATE
5.6 TUBULAR STEEL
5.7 STEEL BENT PLATE
5.8 STAINLESS STEEL FRAME
5.9 OPEN WEB STEEL JOIST
5.10 S.S. BOLLARD (6" SQ)
5.11 EXT. COLD FORMED METAL FRAMING, SEE STRUCT.
5.12 CANE DETECTION RAIL
5.13 GUARDRAIL
5.14 STAINLESS STEEL HANDRAIL
5.15 METAL FRAMED STAIR
5.16 STEEL CHANNEL
5.17 VISUALLY CONTRASTING STAINLESS STEEL STRIP, SEE SHEET 1/A002 FOR ACCESSIBILITY REQUIREMENTS
5.18 ALUMINUM FLOOR BAR-GRATING **(BID OPTION #3A)**
5.19 DECORATIVE PERFORATED METAL PANEL **(BID OPTION #3B)**
5.20 DECORATIVE METAL MESH VINESCREEN
5.21 STAINLESS STEEL BOLTS AND CAPS

DIVISION 06 - WOOD, PLASTIC & COMPOSITES
6.1 WOOD BLOCK/NAILER, PRESSURE TREATED
6.2 3/4" PLYWOOD UNDERLAYMENT, FIRE RETARDANT TREATED
6.3 5/8" GLASS MAT FACED GYP SHEATHING
6.4 PLASTIC LAMINATE
6.5 SOLID-SURFACING MATERIAL COUNTERTOP
6.6 (NOT USED)
6.7 SS SHIM AS REQUIRED

DIVISION 07 - THERMAL & MOISTURE PROTECTION
7.1 STAINLESS STEEL FLASHING/COUNTERFLASHING
7.2 PVC ROOFING
7.3 MEMBRANE EDGE FASTENER @ 12" O/C
7.4 1/4" PROTECTION BOARD
7.5 RIGID ROOF INSULATION OF AGED R=30 (UON)
7.6 BATT INSULATION R=19
7.7 PVC MEMBRANE FLASHING
7.8 EXTRUDED ALUM TRIM
7.9 ALUM FLASHING
7.10 FORMED SHEET SS COPING
7.11 BELOW GRADE DAMP/WATERPROOFING
7.12 SEALANT WITH BACKER ROD
7.13 20 GA GALVANIZED SPLASH PAN
7.14 DOWN SPOUT
7.15 WATERPROOFING MEMBRANE
7.16 INSULATED METAL PANEL CLADDING
7.17 PVC ROOF SEISMIC JOINT COVER
7.18 EXTERIOR WALL SEISMIC JOINT COVER
7.19 INTERIOR WALL SEISMIC JOINT COVER
7.20 CEILING SEISMIC JOINT COVER
7.21 FIRESTOPPING
7.22 SAND COATED ROOF WALKWAY
7.23 METAL SPANDREL PANEL (INSULATED)
7.24 THERMOPLASTIC MEMBRANE PARAPET FLASHING
7.25 THERMOPLASTIC MEMBRANE COVER STRIP, HOT-AIR WELDED
7.26 EXTRUDED ALUM BAR W/ FASTENERS @ 12" O.C.MAX
7.27 FLOOR SEISMIC JOINT COVER
7.28 S.S. PERFORATED RIBBED METAL PANEL 36" WIDE (20 GA)
7.29 METAL PANEL SOFFIT
7.30 1" RIGID INSULATION BOARD
7.31 WATERPROOF TRAFFIC COATING
7.32 COMPRESSION SEAL
7.33 SILICONE SEALANT
7.34 NEOPRENE SPACER (BLACK).
7.35 OVERFLOW SCUPPER, 8" W x 6" H (BY ROOFING MFR)
7.36 1/2" FOIL-BACKED RIGID INSULATION
7.37 VAPOR BARRIER

DIVISION 08 - OPENINGS
8.1 DOOR & FRAME
8.2 MOTORIZED OPERABLE WINDOW
8.3 MANUAL OPERABLE WINDOW
8.4 AUTOMATIC DOOR BOTTOM
8.5 THRESHOLD
8.6 GLAZED ALUM CURTAIN WALL SYSTEM
8.7 1" INSULATED GLAZING
8.8 FRITTED GLAZING
8.9 SPANDREL GLAZING
8.10 VISION GLASS (SAFETY WHERE REQUIRED)
8.11 (NOT USED)
8.12 AUTOMATIC ENTRANCE DOOR
8.13 SKYLIGHT
8.14 WEATHERSTRIPPING
8.15 MTL SECURITY GATE
8.16 DOOR PULL
8.17 AUTOMATIC DOOR OPERATOR
8.18 EXTRUDED ALUMINUM SUNCONTROL LOUVERS

NOTE:
THE WORK SHOWN ON THIS SHEET SHALL BE INCLUDED IN OPTION ITEM #2
A

DIVISION 09 - FINISHES
9.1 1/2" GWB TYPE X
9.2 5/8" GWB TYPE X
9.3 1" GWB SHAFT LINER
9.4 20 GA MTL STUD @ 16" O/C
9.5 SLOTTED SLIP TRACK
9.6 METAL STUD TRACK
9.7 COLD FORMED FURRING CHANNEL
9.8 SHAFT WALL STUD MIN 20 GA @ 24" O/C
9.9 FRAMING ANGLE, MIN 20 GA GALV
9.10 FURRING CHANNEL MIN 20 GA, SIZE AS NOTED
9.11 SHAFT J RUNNER
9.12 CERAMIC TILE
9.13 REINFORCED MORTAR SETTING BED
9.14 SCHEDULED FLOORING
9.15 SUSPENDED GYP BOARD CEILING SYSTEM
9.16 SCHEDULED WALL BASE
9.17 PAINT
9.18 5/8" CEMENTITIOUS TILE BACKER BOARD
9.19 5/8" GLASS MAT FACED TILE BACKER BOARD
9.20 3/4" RECLAIMED WOOD FLOORING
9.21 SOUND ATTENUATION BLANKET
9.22 ACOUSTICAL INSULATION 3" (UON)
9.23 SUSPENDED ACOUSTICAL CEILING
9.24 STONE TILE
9.25 RECLAIMED WOOD WALL PANEL
9.26 METAL COATINGS AND SEALER
9.27 1/8" ALUMINUM ANGLE TRANSITION STRIP
9.28 OPEN OFFICE CARPET TILE, BACKING & RESILIENT BASE**(BID OPTION #6)**

DIVISION 10 - SPECIALTIES
10.1 TOILET PARTITION
10.2 (NOT USED)
10.3 METAL LOCKER
10.4 FIRE EXTINGUISHER CABINET
10.5 DOOR STOP
10.6 ALUM LIGHT SHELF, INTEGRAL COMPONENT OF CURTAIN WALL **(BID OPTION #4)**
10.7 VINE SCREEN SYSTEM
10.8 EXTRUDED ALUM LOUVER AIRFOIL **(BID OPTION #2)**
10.9 STAINLESS STEEL DIMENSIONAL SIGNAGE
10.10 ACCESS FLOORING- 10" HIGH (LAYOUT BY MFR.)
10.11 EXTERIOR CANOPY

DIVISION 11 - EQUIPMENT
11.1 MOTORIZED PROJECTION SCREEN
11.2 PROJECTOR

DIVISION 12 - FURNISHINGS
12.1 MOTORIZED WINDOW SHADE
12.2 SYSTEM FURNITURE, NIC
12.3 ENTRANCE FLOOR MAT & FRAME
12.4 RADIOMETER

DIVISION 13 - EQUIPMENT
13.1 BUILDING INTEGRATED PHOTOVOLTAIC GLASS CANOPY **(BID OPTION #1)**

DIVISION 14 - EQUIPMENT
14.1 HYDRAULIC HOLELESS ELEVATOR, 3500 LB

DIVISION 21 - FIRE PROTECTION
21.1 FIRE SPRINKLER HEAD
21.2 FIRE SPRINKLER PIPING

DIVISION 22 - PLUMBING
REFER TO P601 FOR TOILET FIXTURE SCHEDULE
22.1 ROOF DRAIN
22.2 NOT USED
22.3 VENT THROUGH ROOF
22.4 ELECTRIC WATER COOLER
22.5 KITCHEN SINK
22.6 SERVICE SINK
22.7 FLOOR DRAIN
22.8 FILTERED WATER SYSTEM FAUCET
22.9 DUAL FLUSH TOILET
22.10 HIGH EFFICIENCY TOILET
22.11 LOW CONSUMPTION URINAL
22.12 COUNTERTOP SINK
22.13 ELECTRONIC LAVATORY FAUCET / AUTOMATIC HANDSOAP DISPENSER, TYP.
22.14 HAND SHOWER SET WITH SLIDE BAR
22.15 URINAL ELECTRONIC FLUSH VALVE

DIVISION 23 - HVAC
23.1 BOILER FLUE
23.2 DUCT
23.3 PERIMETER HYDRONIC HEATER
23.4 FIRE DAMPER
23.5 RADIANT CEILING PANEL
23.6 MECHANICAL SHAFT OPENING
23.7 RADIANT FLOOR SLAB SYSTEM
23.8 MECHANICAL PIPING
23.9 ROOF MOUNTED MECH EQUIPMENT

DIVISION 26 - ELECTRICAL
26.1 LIGHT FIXTURE
26.2 CARD READER
26.3 PHOTOVOLTAIC INVERTER
26.4 POWER - DUPLEX
26.5 POWER - QUAD
26.6 POWER/DATA OUTLET COMBINATION
26.7 SWITCH
26.8 FUTURE CCTV CAMERA

DIVISION 28 - FIRE PROTECTION
28.1 FIRE ALARM MANUAL PULL STATION

DIVISION 32 - EXTERIOR IMPROVEMENTS
32.1 CONCRETE PAVING

PROJECT STATUS

PROPOSAL SET 07/23/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	7/1/09	ADDED NOTE	FB

DRAWN	S MOSHGGOU	DATE
DESIGNED	R PRADHAN	DATE
CHECKED	W JOFFRION	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

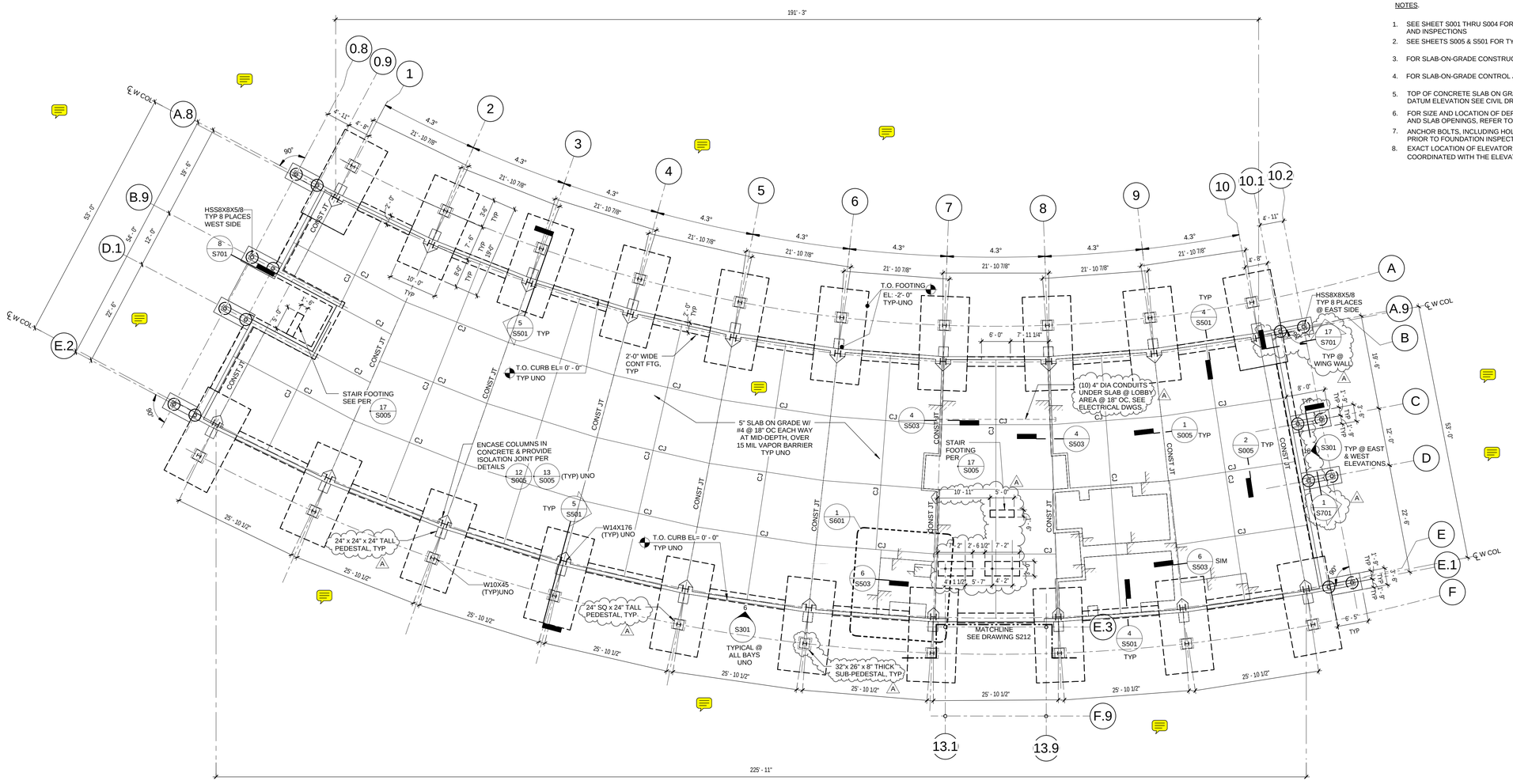
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

VERTICAL & HORIZONTAL SHADE DETAILS (BID OPTION #3)

SIZE	CAGE CODE		REV
D	25307	A232-0800- A705	A
SCALE	INDEX	SHEET	OF

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NOTES.

1. SEE SHEET S001 THRU S004 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INSPECTIONS
2. SEE SHEETS S005 & S501 FOR TYPICAL FOUNDATION & SLAB DETAILS.
3. FOR SLAB-ON-GRADE CONSTRUCTION JOINTS SEE DETAIL 1/S005
4. FOR SLAB-ON-GRADE CONTROL JOINTS SEE DETAIL 2/S005
5. TOP OF CONCRETE SLAB ON GRADE (T.O.C) IS -0'-10" FROM FINISH FLOOR DATUM ELEVATION SEE CIVIL DRAWINGS FOR BENCHMARK ELEVATION.
6. FOR SIZE AND LOCATION OF DEPRESSED SLABS, CURBS, ELEVATOR PITS, AND SLAB OPENINGS, REFER TO ARCHITECTURAL DRAWINGS.
7. ANCHOR BOLTS, INCLUDING HOLD-DOWN ANCHORS, SHALL BE TIED IN PLACE PRIOR TO FOUNDATION INSPECTION.
8. EXACT LOCATION OF ELEVATOR GUIDE RAIL SUPPORT POSTS SHALL BE COORDINATED WITH THE ELEVATOR MANUFACTURER.

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

MARK	DATE	DESCRIPTION	INITIAL
A	5/26/09	RELOCATED STAIR COLUMNS, REVISED COL PEDESTAL SIZES & ADDED CONDUIT QUANTITY & SPACING	JN

KEY PLAN

NORTH ARROW

BLDG NORTH / TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

		DATE
DRAWN	J. NAGANO	
DESIGNED	J. LIVERMORE	
CHECKED	N.SHAH	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

Ames Research Center
Moffett Field, California

N232 COLLABORATIVE SUPPORT FACILITY

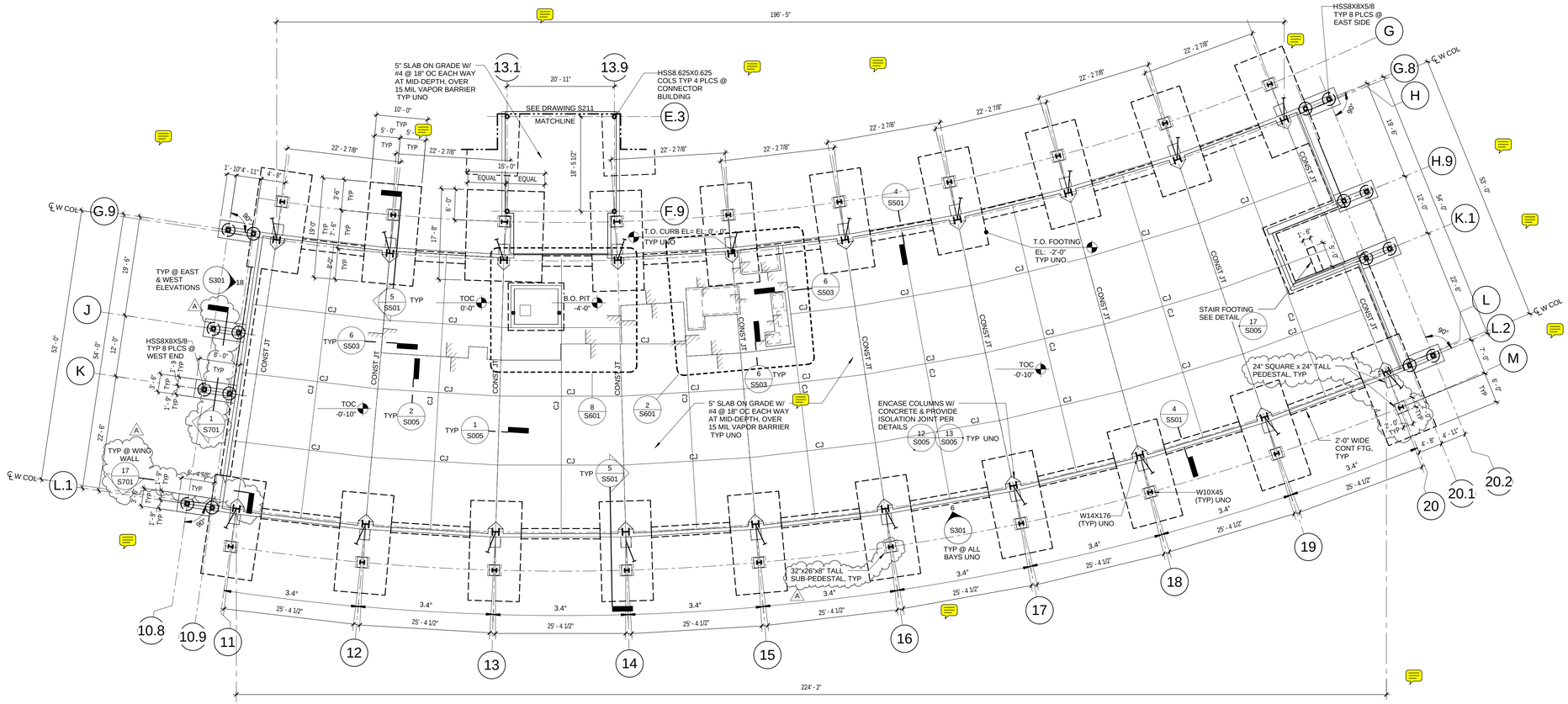
PARTIAL FOUNDATION PLAN NORTH WING

SIZE	CAGE CODE			REV
D	25307	A232-0800-	S211	A
SCALE		INDEX	SHEET OF	

12/18/2009 12:34:51 PM

NOTES:

1. SEE SHEET S001 THRU S004 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INSPECTIONS
2. SEE SHEETS S005 & S501 FOR TYPICAL FOUNDATION & SLAB DETAILS.
3. FOR SLAB-ON-GRADE CONSTRUCTION JOINTS SEE DETAIL 1/S005
4. FOR SLAB-ON-GRADE CONTROL JOINTS SEE DETAIL 2/S005
5. TOP OF CONCRETE SLAB-ON-GRADE (T.O.C.) IS -0'-10" FROM FINISH FLOOR DATUM ELEVATION SEE CIVIL DRAWINGS FOR BENCHMARK ELEVATION.
6. FOR SIZE AND LOCATION OF DEPRESSED SLABS, CURBS, ELEVATOR PITS, AND SLAB OPENINGS, REFER TO ARCHITECTURAL DRAWINGS.
7. ANCHOR BOLTS, INCLUDING HOLD-DOWN ANCHORS, SHALL BE TIED IN PLACE PRIOR TO FOUNDATION INSPECTION.
8. EXACT LOCATION OF ELEVATOR GUIDE RAIL SUPPORT POSTS SHALL BE COORDINATED WITH THE ELEVATOR MANUFACTURER.



12/18/2009 12:34:57 PM

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
A	5/26/09	REVISED COLUMN PEDESTAL SIZES & ADDED WING WALL SECTIONS	JN
MARK	DATE	DESCRIPTION	INITIAL

KEY PLAN

NORTH ARROW: BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

		DATE
DRAWN	J. NAGANO	
DESIGNED	J. LIVERMORE	
CHECKED	N. SHAH	
PROJMGR	J GRANT	
REQUESTOR	R SCHULER	
R&QA		
SAFETY		
SUPERVISOR	S FRANKEL	

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

PARTIAL FOUNDATION PLAN SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- S212	A
SCALE		INDEX	SHEET OF



NOTES:

1. SEE SHEET S001 THRU S005 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INSPECTIONS.
2. SEE SHEETS S-005 THRU S-009 FOR TYPICAL DETAILS.
3. CENTERLINE OF W COLUMNS AT GRID LINE, TYPICAL UNO.
4. FOR METAL DECK SECTION PROPERTIES & WELDING REQUIREMENTS, SEE DETAIL 9/S008
5. PROVIDE 3/4"x4.5" TALL HEADED STUDS FOR ALL BEAMS AT 1'-0" O.C. TYPICAL UNO. EXCEPT ON ALL W14x22 BEAMS AND WITHIN THE PLASTIC HINGING ZONE AS INDICATED IN DETAIL 15/S006.
6. ▶—◀ INDICATES FULL MOMENT CONNECTION REQUIREMENTS PER SHEET S002, S004 AND S006.
7. NOT USED
8. C=3/4" INDICATES BEAM CAMBER.
9. W16x INDICATES FULL HEIGHT SHEAR TAB PER. 12/S007
10. → INDICATES BOTTOM FLANGE BRACE PER TYPICAL DETAIL 8/S008 EQUALLY SPACED ALONG BEAM SPAN TYP, U.N.O.
11. —■ INDICATES DRAG CONNECTION PER TYPICAL DETAIL 13/S007
12. NOT USED
13. FOR VERTICAL BRACING ELEVATIONS, SEE SHEET S501.
14. SEE SHEET S211 & S212 FOR COLUMN SIZES WHICH EXTEND TO FOUNDATION. COLUMNS WITH SIZES NOTED ON THIS SHEET, BEGINS ABOVE THIS FLOOR BEAM TOP OF STEEL LEVEL.
15. TOP OF STEEL ELEVATION = 13'-3" U.NO.
16. FOR EDGE OF DECK DIMENSIONS, REFER TO ARCHITECTURAL DRAWINGS.
17. CONTRACTOR MAY SUBSTITUTE CASTELLATED GIRDERS IN LIEU OF THE W33X118 FLOOR GIRDERS. CASTELLATED FLOOR GIRDERS SHALL BE ENGINEERED BY A CALIFORNIA REGISTERED STRUCTURAL ENGINEER, AND SUBMITTED TO STRUCTURAL ENGINEER OF RECORD FOR APPROVAL. ENGINEER SHALL DESIGN GIRDERS TO COMPLY WITH THE SPECIFIED VERTICAL LOADS AND BUILDING CODE ON S001.
A. CASTELLATED BEAMS SHALL BE DESIGNED FOR THE FOLLOWING:
 Mu = 1360.0 kft (MAX)
 Vu = 45.8 k (MAX)
 △LL = L/360
 Pu = 46.2 k (MAX)
 d = 33 in (MAX)
18. FLOOR GIRDERS ALONG GRIDS 2-9 SHALL HAVE WEB OPENING AS DETAILED IN 6/S311

KEY PLAN

NORTH ARROW — BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"
0' 4' 12' 24' 42'-8"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

MARK	DATE	DESCRIPTION	INITIAL
A	6/12/09	REVISED NOTE 17, REVISED BALCONY AND FIN WALL STRUCTURE. ADDED CONDUITS IN SLAB.	JN

DRAWN	J. NAGANO	DATE
DESIGNED	J. LIVERMORE	DATE
CHECKED	N. SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

PARTIAL SECOND FLOOR FRAMING PLAN NORTH WING

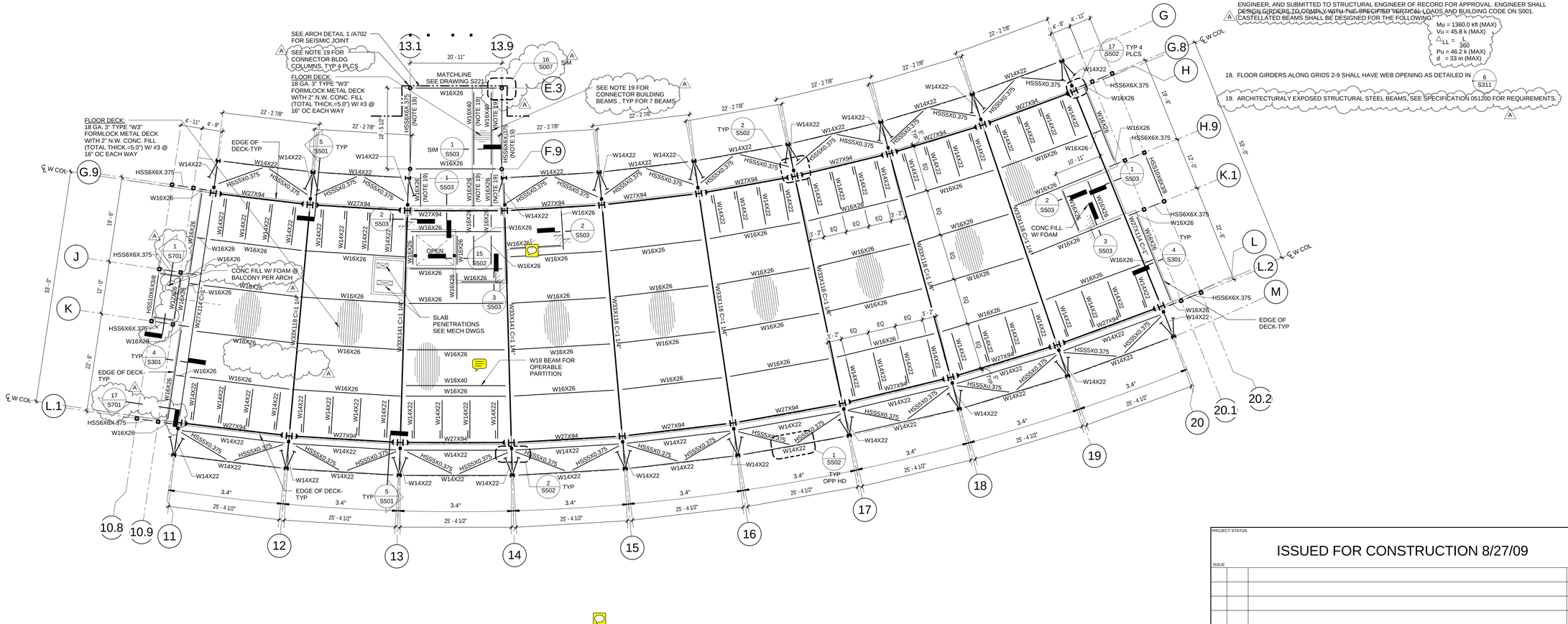
SIZE	CAGE CODE		REV
D	25307	A232-0800- S221	A

SCALE | INDEX | SHEET | OF

12/18/2009 12:34:59 PM

NOTES:

1. SEE SHEET S001 THRU S004 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INPECTIONS.
2. SEE SHEETS S005 THRU S009 FOR TYPICAL DETAILS.
3. CENTERLINE OF W COLUMNS AT GRID LINE, TYPICAL UNO.
4. FOR METAL DECK SECTION PROPERTIES & WELDING REQUIREMENTS, SEE DETAIL 9/S008
5. PROVIDE 3/4"x4.5" TALL HEADED STUDS FOR ALL BEAMS AT 1'-0" O.C. TYPICAL UNO. EXCEPT ON ALL W14x22 BEAMS AND WITHIN THE PLASTIC HINGING ZONE AS INDICATED DETAIL 15/S006.
6. ▶—◀ INDICATES FULL MOMENT CONNECTION PER SHEETS S002, S004 AND S006.
7. NOT USED
8. C=3/4" INDICATES BEAM CAMBER.
9. —— W16x —— INDICATES FULL HEIGHT SHEAR TAB PER 12/S007
10. ——> INDICATES BOTTOM FLANGE BRACE PER TYPICAL DETAIL 8/S008, EQUALLY SPACED ALONG BEAM SPAN TYP, U.N.O.
11. ——■ INDICATES DRAG CONNECTION PER TYPICAL DETAIL 13/S007
12. NOT USED
13. FOR VERTICAL BRACING ELEVATIONS, SEE SHEET S501.
14. SEE SHEET S211 & S212 FOR COLUMN SIZES WHICH EXTEND TO FOUNDATION. COLUMNS WITH SIZES NOTED ON THIS SHEET, BEGINS ABOVE THIS FLOOR BEAM TOP OF STEEL LEVEL.
15. TOP OF STEEL ELEVATION = 13'-3" U.NO.
16. FOR EDGE OF DECK DIMENSIONS, REFER TO ARCHITECTURAL DRAWINGS.
17. CONTRACTOR MAY SUBSTITUTE CASTELLATED GIRDERS IN LIEU OF THE W33X118 FLOOR GIRDERS. CASTELLATED FLOOR GIRDERS SHALL BE ENGINEERED BY A CALIFORNIA REGISTERED STRUCTURAL ENGINEER, AND SUBMITTED TO STRUCTURAL ENGINEER OF RECORD FOR APPROVAL. ENGINEER SHALL DESIGN GIRDERS TO COMPLY WITH THE SPECIFIED VERTICAL LOADS AND BUILDING CODE ON S001.
A CASTELLATED BEAMS SHALL BE DESIGNED FOR THE FOLLOWING:
 Mu = 1360.0 kft (MAX)
 Vu = 45.8 k (MAX)
 Δ LL = L/360
 Pu = 46.2 k (MAX)
 d = 33 in (MAX)
18. FLOOR GIRDERS ALONG GRIDS 2-9 SHALL HAVE WEB OPENING AS DETAILED IN 6/S311
19. ARCHITECTURALY EXPOSED STRUCTURAL STEEL BEAMS, SEE SPECIFICATION 051200 FOR REQUIREMENTS. A



KEY PLAN

NORTH ARROW — BLDG NORTH, TRUE NORTH

SCALE: 3/32" = 1'-0"
0' 4' 12' 24' 42'-8"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

MARK	DATE	DESCRIPTION	INITIAL
A	6/12/09	REVISED NOTE 17, ADDED NOTE 19, REVISED BALCONY AND FIN WALL STRUCTURE	JN

DRAWN	J NAGANO	DATE
DESIGNED	J LIVERMORE	DATE
CHECKED	N SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffett Field, California

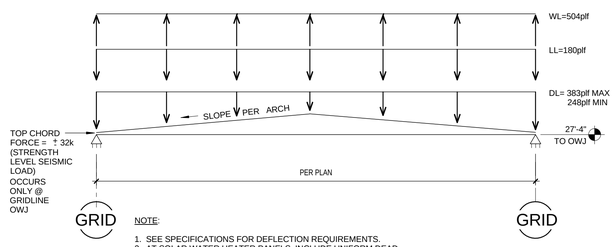
N232 COLLABORATIVE SUPPORT FACILITY

PARTIAL SECOND FLOOR FRAMING PLAN SOUTH WING

SIZE	CAGE CODE		REV
D	25307	A232-0800- S222	A
SCALE	INDEX	SHEET OF	

12/18/2009 12:35:02 PM





NOTE:

1. SEE SPECIFICATIONS FOR DEFLECTION REQUIREMENTS.
2. AT SOLAR WATER HEATER PANELS, INCLUDE UNIFORM DEAD LOAD OF 711 plf (INCLUDED CONCRETE WEIGHT).
3. CONTRACTOR TO COORDINATE WEIGHT OF OPERABLE PARTITION WALL WITH STEEL JOIST MANUFACTURER.
4. SEE ENLARGED FRAMING PLAN S602 FOR WEIGHT OF UNITS. STEEL JOISTS SHALL ALSO BE DESIGNED FOR THE CONCRETE PAD WEIGHT.
5. MANUFACTURER SHALL DETERMINE BRIDGING WHERE UNIT BEAMS CONFLICT WITH THE TYPICAL BRIDGING.

1 / S231 OPEN WEB JOIST LOADING DIAGRAM

NOT TO SCALE

NOTES:

1. SEE SHEET S001 THRU S005 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INSPECTIONS.
2. SEE SHEETS S005 THRU S009 FOR TYPICAL DETAILS.
3. CENTERLINE OF W COLUMNS AT GRID LINE, TYPICAL UNO.
4. FOR METAL DECK SECTION PROPERTIES & WELDING REQUIREMENTS, SEE DETAIL 9/S008
5. ▶—◀ INDICATES FULL MOMENT CONNECTION REQUIREMENTS PER SHEET S002,S004 AND S006.
6. NOT USED
7. C=3/4" INDICATES BEAM CAMBER.
8. W16x INDICATES FULL HEIGHT SHEAR TAB PER 12/S007
9. → INDICATES BOTTOM FLANGE BRACE PER TYPICAL DETAIL 8/S008, EQUALLY SPACED ALONG BEAM SPAN TYP, U.N.O.
10. ■— INDICATES DRAG CONNECTION PER TYPICAL DETAIL 13/S007
11. NOT USED
12. FOR VERTICAL BRACING ELEVATIONS, SEE SHEET S-501.
13. SEE SHEET S211 & S212 FOR COLUMN SIZES WHICH EXTEND TO FOUNDATION. COLUMNS WITH SIZES NOTED ON THIS SHEET, BEGINS ABOVE THIS FLOOR BEAM TOP OF STEEL LEVEL.
14. TOP OF STEEL ELEVATION = 26'-10" U.N.O.
15. OPEN WEB STEEL JOISTS SHALL BE DESIGNED IN ACCORDANCE W/ THE MINIMUM DESIGN LOADS INDICATED IN THE OPEN WEB JOIST LOADING DIAGRAM, THIS SHEET.
16. FOR EDGE OF DECK DIMENSIONS, REFER TO ARCHITECTURAL DRAWINGS.
17. CONTRACTOR TO COORDINATE WITH OPEN WEB JOIST MANUFACTURER ON EXACT SIZE, WEIGHT LOCATION OF MECHANICAL/ELECTRICAL EQUIPMENT
18. OPEN WEB JOIST MANUFACTURER MAY DESIGN FOR DOUBLE-TRUSS UNDER MECHANICAL/ELECTRICAL UNITS IF NECESSARY.
19. SEE DETAIL 19/S502 FOR BEAM TOS @ GRID LINES B & E = 27'-4".

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	6/12/09	REVISED BALCONY AND FIN WALL STRUCTURE, DIMENSION EDGE OF DECK	JN

KEY PLAN

NORTH ARROW

BLDG NORTH 7° TRUE NORTH

SCALE: 1/32" = 1'-0"

0' 16' 32' 64' 128'

DRAWN	J. NAGANO	DATE
DESIGNED	J. LIVERMORE	DATE
CHECKED	N. SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

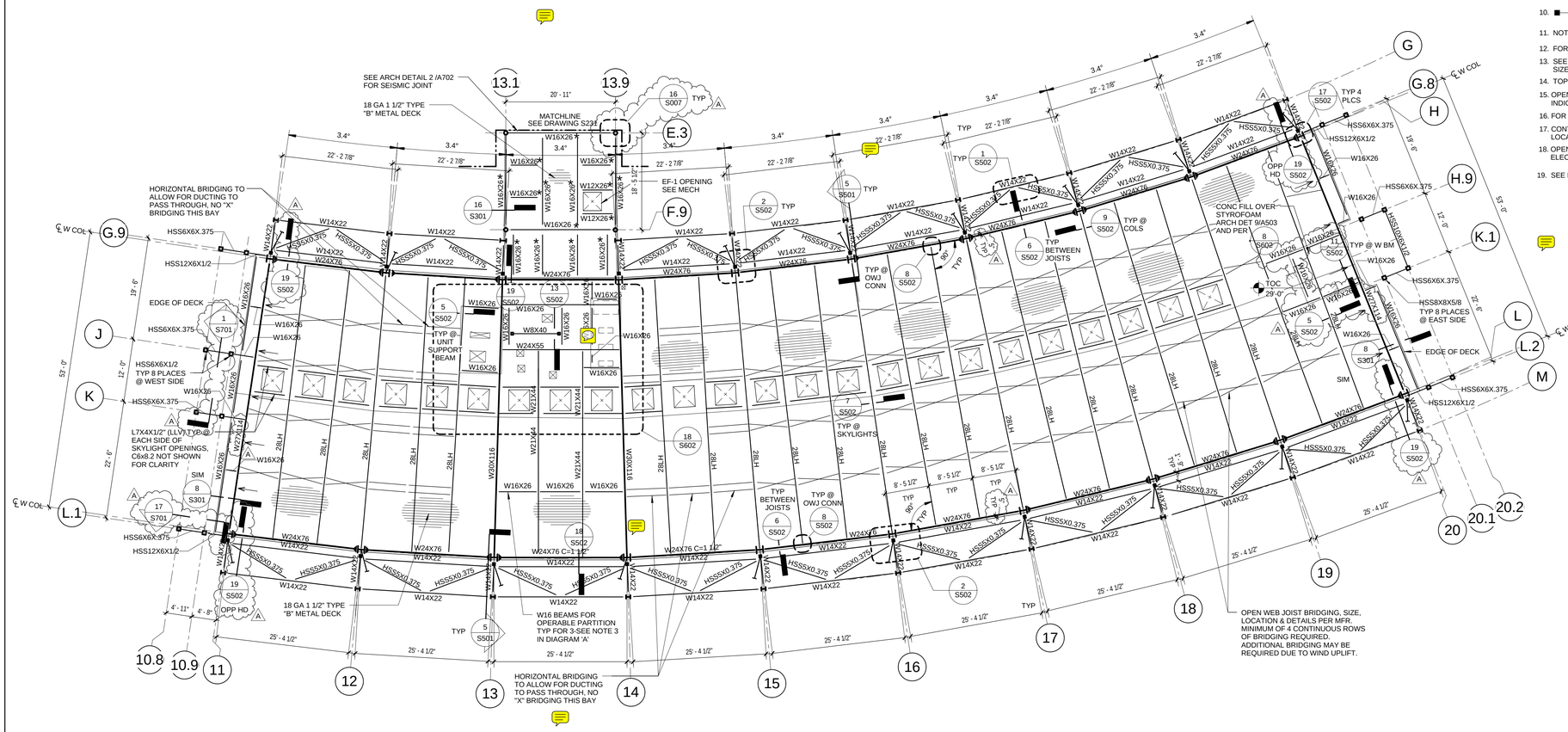
PARTIAL ROOF FRAMING PLAN NORTH WING

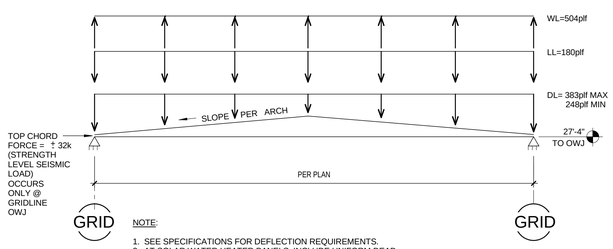
SIZE	CAGE CODE		REV
D	25307	A232-0800- S231	A
SCALE	INDEX	SHEET	OF

12/18/2009 12:35:06 PM

NOTES:

1. SEE SHEET S001 THRU S004 FOR GENERAL NOTES, SYMBOLS, ABBREVIATIONS AND INSPECTIONS.
2. SEE SHEETS S005 THRU S009 FOR TYPICAL DETAILS.
3. CENTERLINE OF W COLUMNS AT GRID LINE, TYPICAL UNO.
4. FOR METAL DECK SECTION PROPERTIES & WELDING REQUIREMENTS, SEE DETAIL 9/S008
5. ▶— —◀ INDICATES FULL MOMENT CONNECTION REQUIREMENTS PER SHEET S002,S004 AND S006.
6. ★ INDICATES TOS = 27'-4" (CONTRACTOR TO VERIFY THIS TOS WITH OWJ MANUFACTURER) A
7. C=3/4" INDICATES BEAM CAMBER.
8. ___ W16x ___ INDICATES FULL HEIGHT SHEAR TAB PER 12/S007
9. ——> INDICATES BOTTOM FLANGE BRACE PER TYPICAL DETAIL 8/S008 ; EQUALLY SPACED ALONG BEAM SPAN TYP, U.N.O.
10. ■—— INDICATES DRAG CONNECTION PER TYPICAL DETAIL 13/S007
11. NOT USED
12. FOR VERTICAL BRACING ELEVATIONS, SEE SHEET S-501.
13. SEE SHEET S211 & S212 FOR COLUMN SIZES WHICH EXTEND TO FOUNDATION. COLUMNS WITH SIZES NOTED ON THIS SHEET, BEGINS ABOVE THIS FLOOR BEAM TOP OF STEEL LEVEL.
14. TOP OF STEEL ELEVATION = 26'-10" U.N.O.
15. OPEN WEB STEEL JOISTS SHALL BE DESIGNED IN ACCORDANCE W/ THE MINIMUM DESIGN LOADS INDICATED IN OPEN WEB JOIST LOADING DIAGRAM, THIS SHEET.
16. FOR EDGE OF DECK DIMENSIONS, REFER TO ARCHITECTURAL DRAWINGS.
17. CONTRACTOR TO COORDINATE WITH OPEN WEB JOIST MANUFACTURER ON EXACT SIZE, WEIGHT LOCATION OF MECHANICAL/ELECTRICAL EQUIPMENT
18. OPEN WEB JOIST MANUFACTURER MAY DESIGN FOR DOUBLE-TRUSS UNDER MECHANICAL/ ELECTRICAL UNITS IF NECESSARY.
19. SEE DETAIL 19/S502 FOR BEAM TOS @ GRID LINES H & L = 27'-4".





NOTE:

1. SEE SPECIFICATIONS FOR DEFLECTION REQUIREMENTS.
2. AT SOLAR WATER HEATER PANELS, INCLUDE UNIFORM DEAD LOAD OF 711 plf (INCLUDED CONCRETE WEIGHT)
3. CONTRACTOR TO COORDINATE WEIGHT OF OPERABLE PARTITION WALL WITH STEEL JOIST MANUFACTURER.
4. SEE ENLARGED FRAMING PLAN S602 FOR WEIGHT OF UNITS. STEEL JOISTS SHALL ALSO BE DESIGNED FOR THE CONCRETE PAD WEIGHT.
5. MANUFACTURER SHALL DETERMINE BRIDGING WHERE UNIT BEAMS CONFLICT WITH THE TYPICAL BRIDGING.

1 / S232 OPEN WEB JOIST LOADING DIAGRAM

NOT TO SCALE

KEY PLAN

NORTH ARROW

BLDG NORTH (TRUE NORTH)

SCALE: 3/32" = 1'-0"

0' 4' 12' 24' 42'-8"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	6/12/09	REVISED NOTE 6, REVISED BALCONY AND FIN WALL FRAMING, ADDED EOD DIM. CHANGED BEAM AT LINES 11 AND 20	JN

DRAWN	J. NAGANO	DATE
DESIGNED	J. LIVERMORE	DATE
CHECKED	N. SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

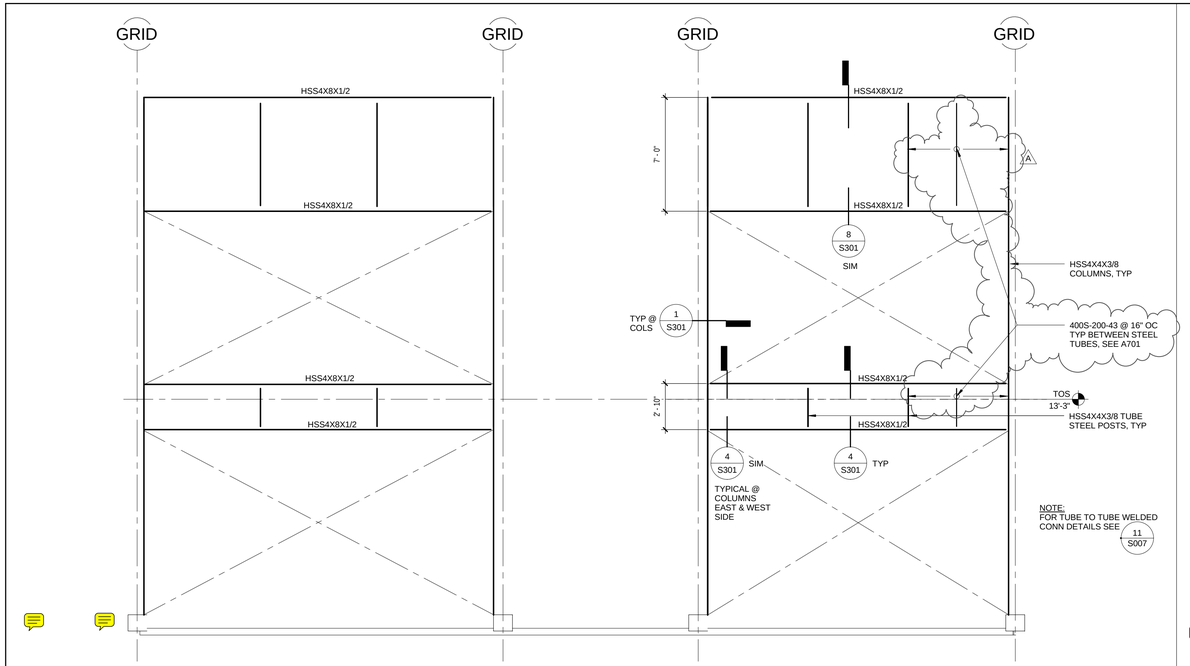
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

PARTIAL ROOF FRAMING PLAN SOUTH WING

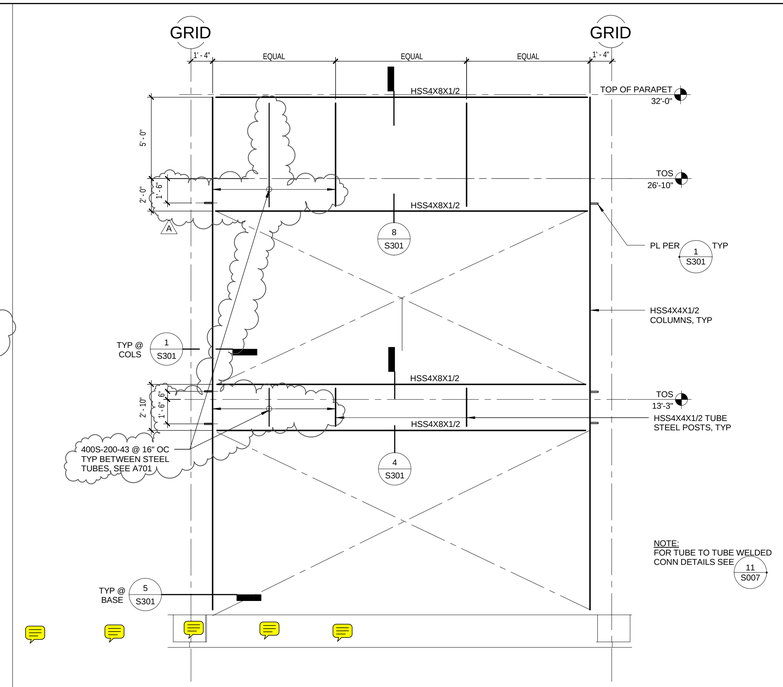
SIZE	CAGE CODE		REV
D	25307	A232-0800- S232	A
SCALE	INDEX	SHEET	OF

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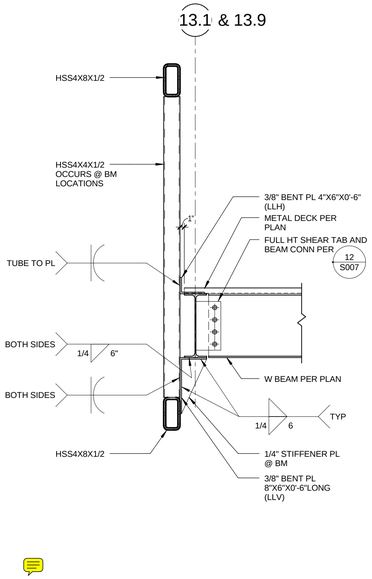
18 | S301 | TYPICAL END CURTAIN WALL ELEVATION

REF: S211 SCALE: 1/4" = 1'-0"



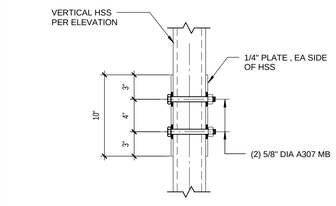
6 | S301 | TYPICAL CURTAIN WALL ELEVATION

REF: S211 SCALE: 1/4" = 1'-0"



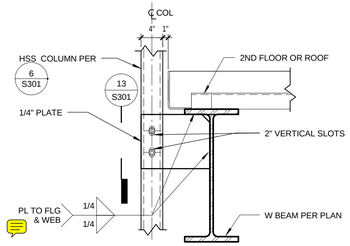
16 | S301 | PARAPET SECTION AT CONNECTOR

REF: S232 SCALE: 3/4" = 1'-0"



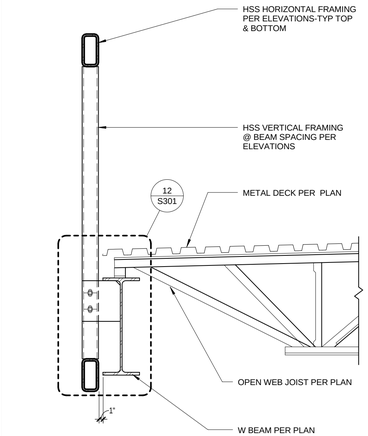
13 | S301 | PLATE CONN TO VERTICAL HSS

REF: S301 SCALE: 1 1/2" = 1'-0"



12 | S301 | TYPICAL LATERAL ONLY SUPPORT

REF: S301 SCALE: 1" = 1'-0"



8 | S301 | TYPICAL CURTAIN WALL FRAMING AT PARAPET

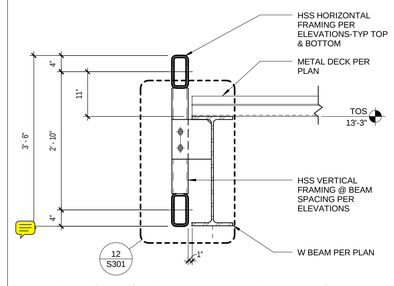
REF: S231 SCALE: 3/4" = 1'-0"

5 | S301 | TYPICAL CURTAIN WALL FRAMING AT COLUMN BASE

REF: S301 SCALE: 3/4" = 1'-0"

1 | S301 | TYPICAL CURTAIN WALL FRAMING AT COLUMN

REF: S301 SCALE: 3/4" = 1'-0"



4 | S301 | TYPICAL CURTAIN WALL FRAMING AT 2ND FLOOR

REF: S221 SCALE: 3/4" = 1'-0"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	7/23/09	REVISED DETAILS 1, 5. CLARIFIED DETAILS 6 AND 18	JN

DRAWN	J NAGANO	DATE
DESIGNED	J LIVERMORE	DATE
CHECKED	N. SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

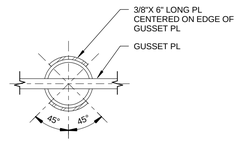
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

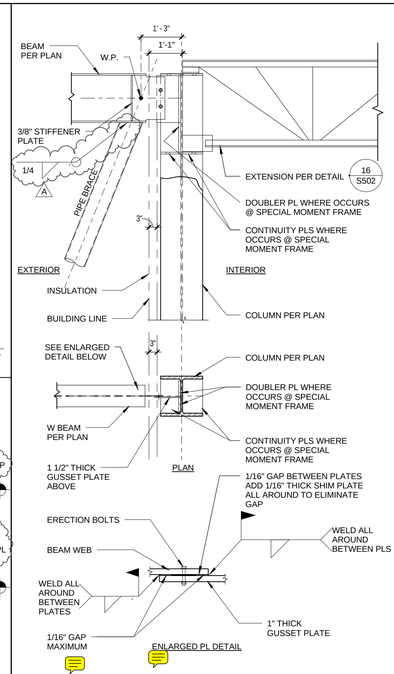
TYPICAL CURTAIN WALL ELEVATIONS AND DETAILS

SIZE	CAGE CODE		REV
D	25307	A232-0800- S301	A
SCALE		INDEX	SHEET OF

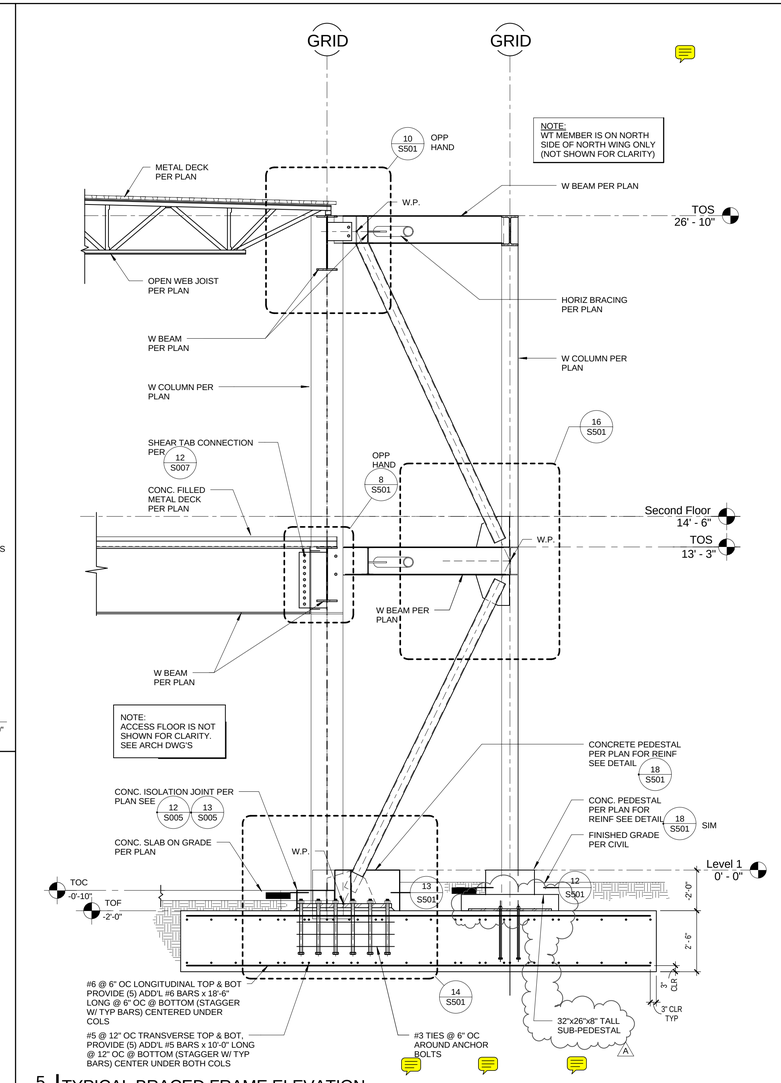
12/18/2009 12:35:15 PM



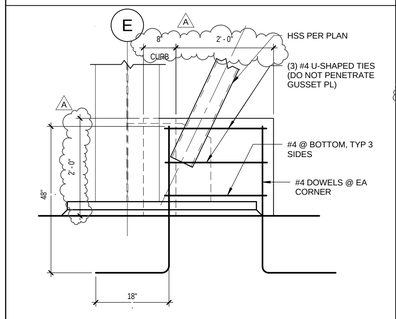
15 | BRACE REINFORCING @ GUSSET PL
S501 | REF: S501 | SCALE: 1 1/2" = 1'-0"



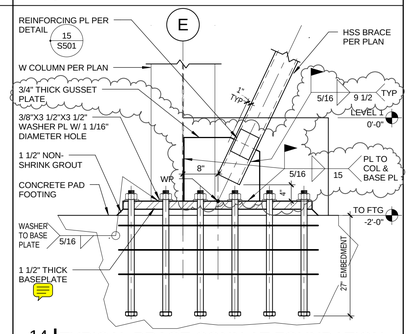
10 | BRACE CONNECTION AT ROOF
S501 | REF: S501 | SCALE: 1/2" = 1'-0"



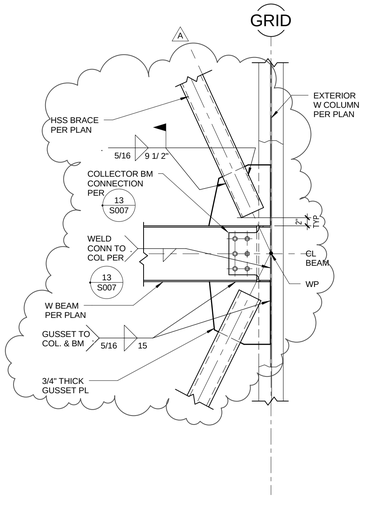
5 | TYPICAL BRACED FRAME ELEVATION
S501 | REF: S211 | SCALE: 3/8" = 1'-0"



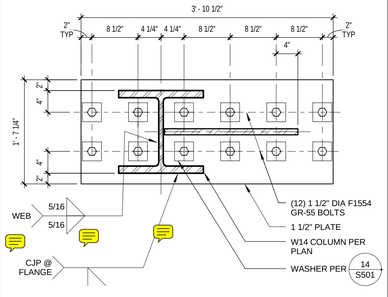
18 | PILASTER REINF AROUND AB
S501 | REF: S501 | SCALE: 3/4" = 1'-0"



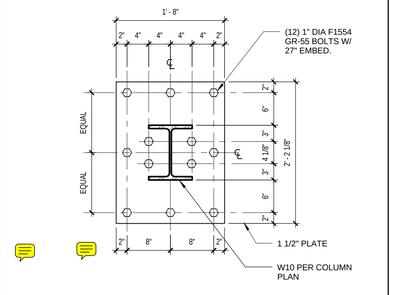
14 | TYPICAL BRACE CONN AT FOUNDATION
S501 | REF: S501 | SCALE: 3/4" = 1'-0"



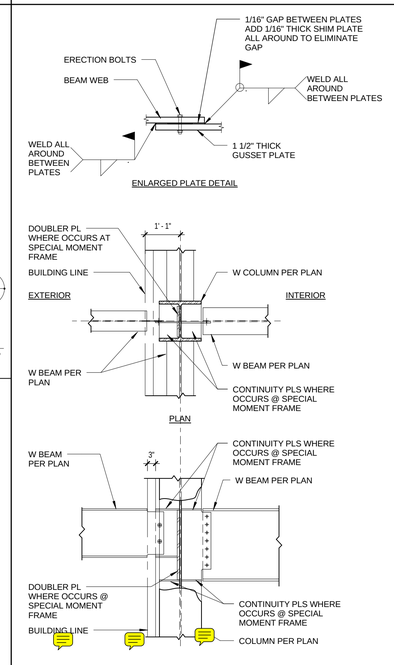
16 | BRACE CONNECTION AT 2ND FLOOR
S501 | REF: S501 | SCALE: 3/4" = 1'-0"



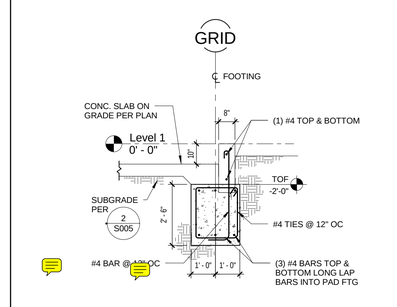
13 | COLUMN BASEPLATE
S501 | REF: S501 | SCALE: 1" = 1'-0"



12 | EXTERIOR COLUMN BASEPLATE
S501 | REF: S501 | SCALE: 1" = 1'-0"



8 | BEAM TO BEAM CONN. AT 2nd FLOOR
S501 | REF: S501 | SCALE: 1/2" = 1'-0"



4 | CURB FOUNDATION DETAIL
S501 | REF: S211 | SCALE: 3/8" = 1'-0"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
A	5/26/09	REVISED BRACE CONNECTIONS AND PEDESTALS	JN
MARK	DATE	DESCRIPTION	INITIAL

DRAWN	J NAGANO	DATE
DESIGNED	J LIVERMORE	DATE
CHECKED	N SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

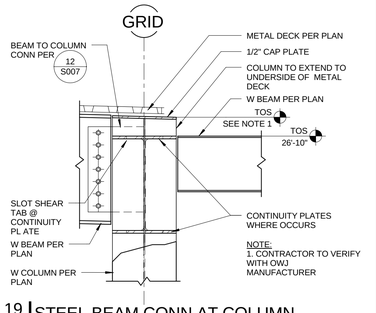
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

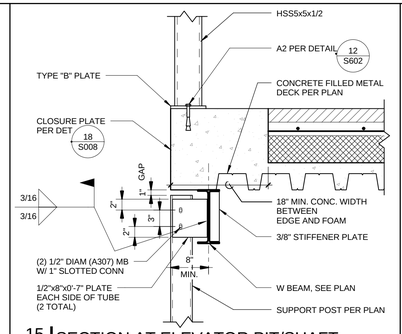
SECTIONS AND DETAILS

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SCALE	INDEX	SHEET	OF

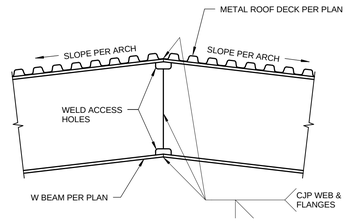
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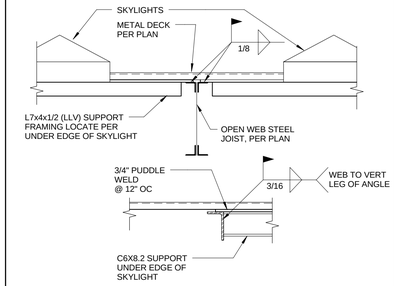
19 | S502 | STEEL BEAM CONN AT COLUMN
REF: S231 SCALE: 3/4" = 1'-0"



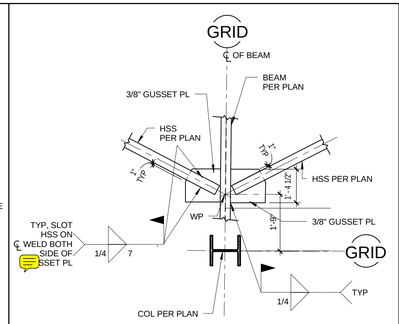
15 | S502 | SECTION AT ELEVATOR PIT/SHAFT
REF: S222 SCALE: 1" = 1'-0"



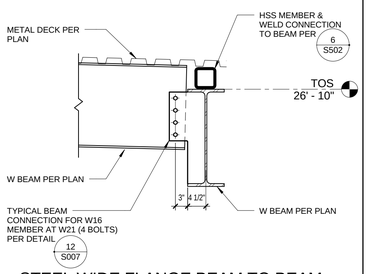
11 | S502 | ROOF BEAM CONN @ RIDGE
REF: S231 SCALE: 3/4" = 1'-0"



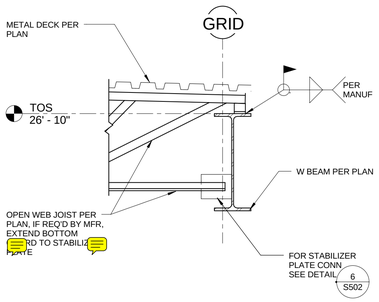
7 | S502 | ANGLE/DECK CONNECTION AT JOIST
REF: S231 SCALE: 3/4" = 1'-0"



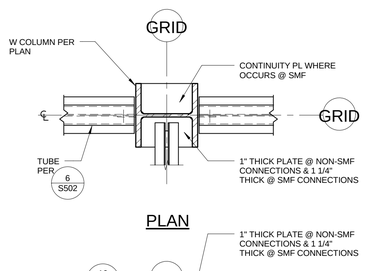
3 | S502 | BRACE DETAIL BETWEEN BEAM
REF: S221 SCALE: 3/8" = 1'-0"



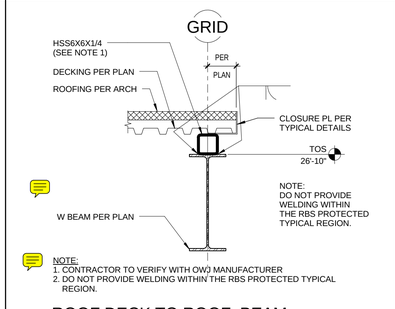
18 | S502 | STEEL WIDE FLANGE BEAM TO BEAM CONNECTION AT ROOF
REF: S232 SCALE: 3/4" = 1'-0"



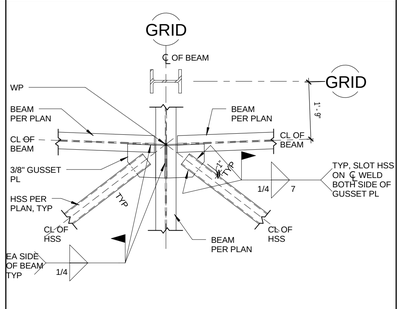
14 | S502 | OWJ CONN AT BEAM
REF: S231 SCALE: 3/4" = 1'-0"



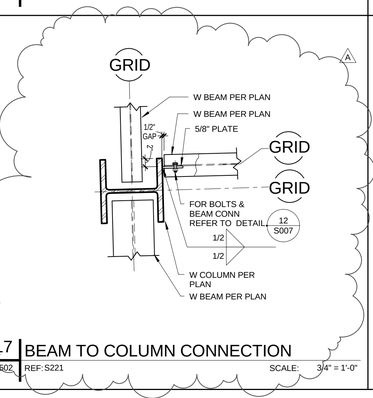
9 | S502 | OWJ CONN AT COLUMN
REF: S231 SCALE: 3/4" = 1'-0"



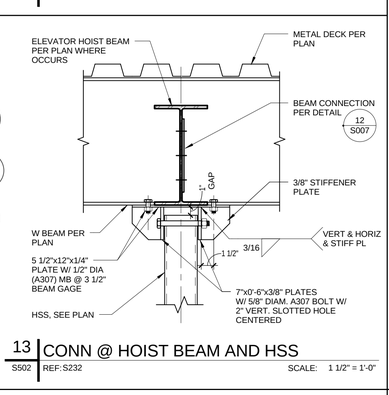
6 | S502 | ROOF DECK TO ROOF BEAM CONNECTION
REF: S231 SCALE: 3/4" = 1'-0"



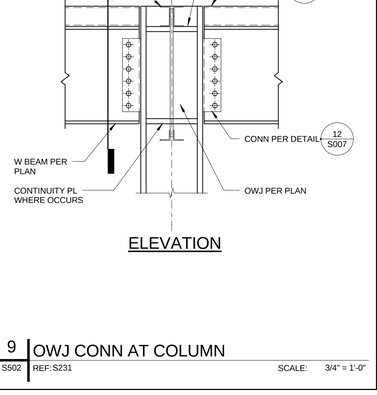
2 | S502 | HSS/BEAM BRACE DETAIL
REF: S221 SCALE: 1/2" = 1'-0"



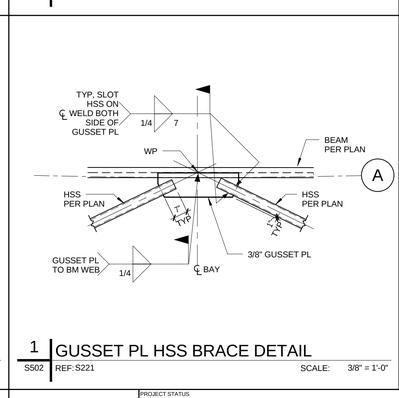
17 | S502 | BEAM TO COLUMN CONNECTION
REF: S221 SCALE: 3/4" = 1'-0"



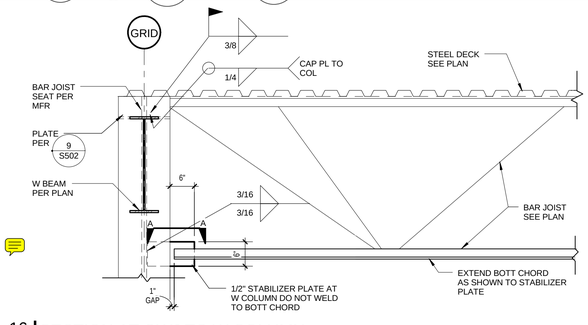
13 | S502 | CONN @ HOIST BEAM AND HSS
REF: S232 SCALE: 1 1/2" = 1'-0"



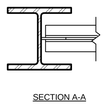
5 | S502 | BEAM CONNECTION TO OWJ
REF: S231 SCALE: 1" = 1'-0"

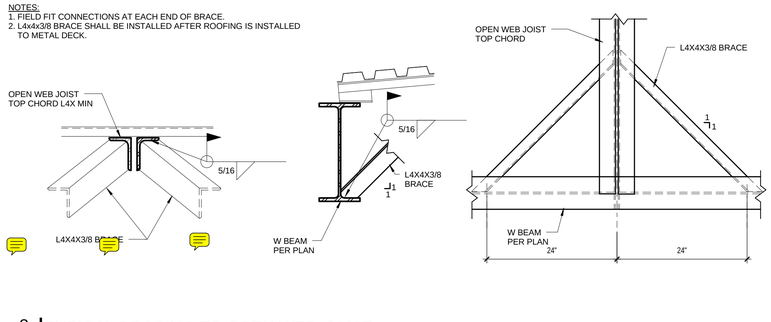


1 | S502 | GUSSET PL HSS BRACE DETAIL
REF: S221 SCALE: 3/8" = 1'-0"



16 | S502 | SECTION AT OWJ TO W COLUMN
REF: S501 SCALE: 3/4" = 1'-0"





8 | S502 | TYPICAL BRACING TO OPEN WEB JOIST
REF: S231 SCALE: 1" = 1'-0"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

ISSUE			
MARK	DATE	DESCRIPTION	INITIAL
A	6/12/09	ADDED DETAIL 17	JN

DRAWN	J NAGANO	DATE
DESIGNED	J LIVERMORE	DATE
CHECKED	N SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

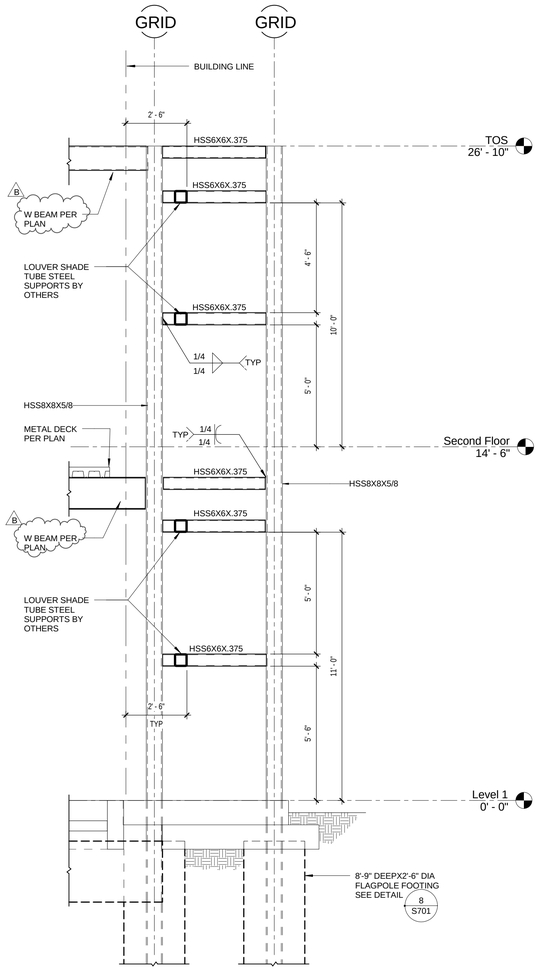
Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

SECTIONS AND DETAILS

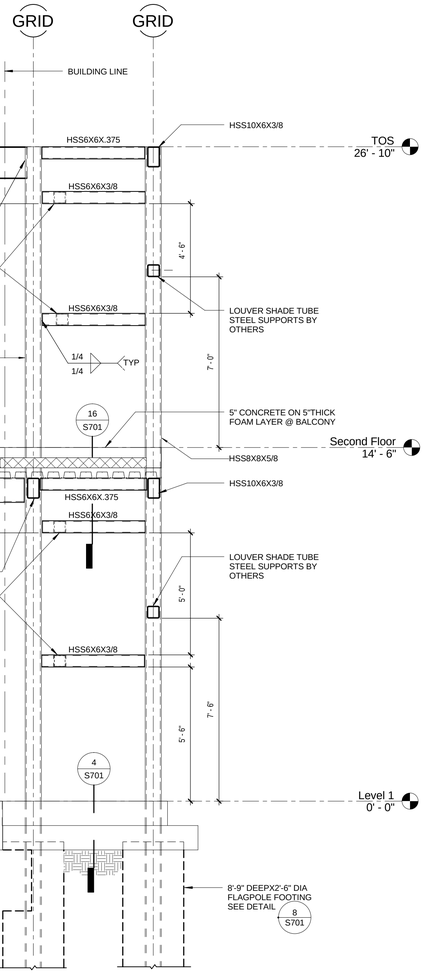
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SCALE		INDEX	SHEET OF

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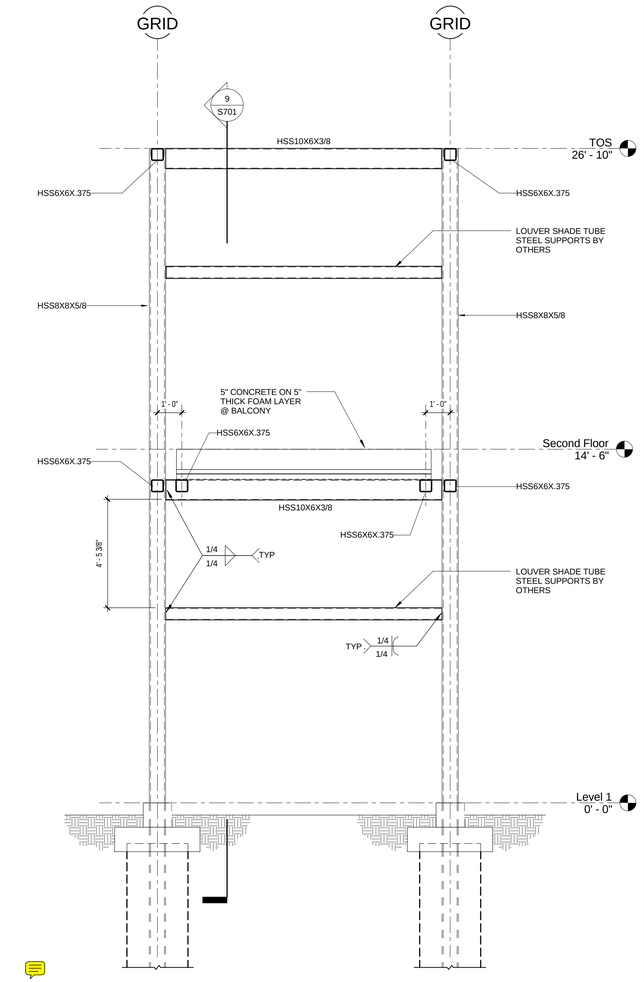
17 | S701 | WING WALL FRAMING @ END

REF: S211 | SCALE: 3/8" = 1'-0"



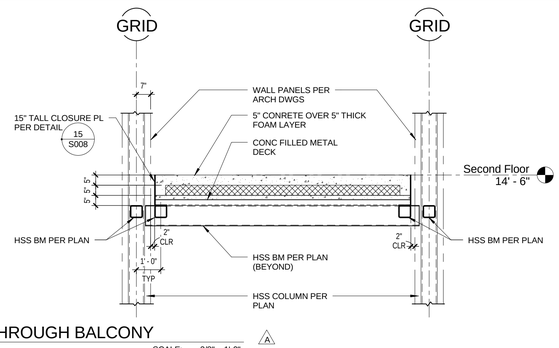
9 | S701 | WING WALL FRAMING @ BALCONY

REF: S701 | SCALE: 3/8" = 1'-0"



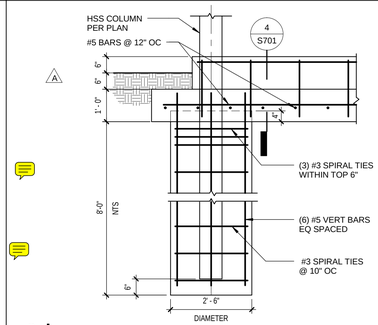
1 | S701 | WING WALL SECTION @ BALCONY

REF: S211 | SCALE: 3/8" = 1'-0"



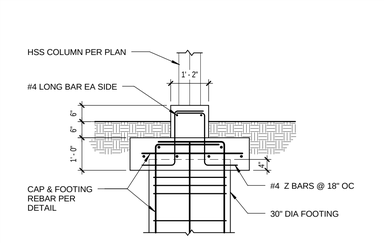
16 | S701 | SECTION THROUGH BALCONY

REF: S701 | SCALE: 3/8" = 1'-0"



8 | S701 | WING WALL COLUMN FOOTING

REF: S211 | SCALE: 1/2" = 1'-0"



4 | S701 | WING WALL FOOTING SECTION

REF: S701 | SCALE: 1/2" = 1'-0"

PROJECT STATUS

ISSUED FOR CONSTRUCTION 8/27/09

MARK	DATE	DESCRIPTION	INITIAL
B	6/12/09	CHANGED HSS BEAMS TO W BEAMS IN DETAILS 9 AND 17	FB
A	5/26/09	ADDED NEW WING WALL SECTIONS AND DETAILS	JN

DRAWN	J NAGANO	DATE
DESIGNED	J LIVERMORE	DATE
CHECKED	N SHAH	DATE
PROJMGR	J GRANT	DATE
REQUESTOR	R SCHULER	DATE
R&QA		DATE
SAFETY		DATE
SUPERVISOR	S FRANKEL	DATE

Ames Research Center
Moffet Field, California

N232 COLLABORATIVE SUPPORT FACILITY

DETAILS

SIZE	CAGE CODE		REV
D	25307	A232-0800- S701	B
SCALE	INDEX	SHEET	OF

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